

MWH Ref: z1449801

28 January 2009

Greater Wellington Regional Council  
PO Box 41  
MASTERTON

**Attention:** Deidre Ross  
Resource Advisor, Environmental Regulation

Dear Deidre

#### **Additional Comments in response to Greater Wellington officer comments**

We set out below comments in response to comments by Deidre Ross as emailed on 22<sup>nd</sup> December 2008. Each of the comments made by Deidre is set out below together with our response. In addition, at the end we make some minor additional comments.

Please also find enclosed a full set of plans referred to below and included in the original documentation, all at A1.

#### **Water Take Application**

- **3.2 Surface Water Resources – this section makes no specific mention of spring which exits from beneath current area of fill and flows in a westerly direction. As this is area to be used for settlement pond construction there will be a need to separate it from the quarry operations.**
- **Note interception of groundwater during quarrying or making a settlement pond would require a further consent – essentially another bore permit – We cannot proceed to notification if further consents are required**
- **4.2.2/5.4 GW did not advise that this groundwater aquifer was under pressure – it is only about 12% allocated, however it is true that more investigations would be required to see if enough water could be drawn for the operation. It might be preferable during summer to have access to bore water as at times the Taratahi water race is restricted due to low flows in the Waingawa River and at such times industrial uses may be stopped (likely to be a condition of consent for taking water from the race).**
- **5.3 – last paragraph - Treatment of stormwater by pond and then filtering over vegetated land – This is highly dependent on rate of flow and may not be adequate in a downpour – do not want to see contaminated water flowing directly to streams**
- **CDC letter providing conditions for water take – all water to be treated and then returned to the network – ie the water race not other local streams or the wetland**

Bullet point 1 - The spring is outside the quarry operating boundaries, has been specifically excluded from the lease area. It is beyond the area which will be affected by either excavation or the settlement pond. Water from the site will pass through the settlement pond and into the "natural" drainage pattern of the site (which has been excavated in the past in this area but is not intended to be excavated further, except as described below for the purposes of the settlement pond). This drainage then joins the water flowing from the spring some distance downstream of the discharge from the settlement pond. As can be seen from the plans and a site visit, the spring will not be affected.

Bullet point 2 - We have reviewed the design of the settlement pond, which is shown as having a slight fall of "natural ground level" (in reality a formerly excavated surface) across its length. A long section is provided (Sheet C04 & C05 Rev A). A level surface is required for maximum settlement, so either slight excavation, or a combination of bunding and excavation may be necessary. Therefore we have provided a further Application Form to cover off the possible need to excavate below the current ground surface. The need for this consent would only be clarified at the stage of finalising the Erosion and Sediment Control Plan, and therefore undertaken as part of meeting a condition of consent. Thus the form is provided on a precautionary basis. Any effects would be de minimis, due to the relatively small area and limited depth involved (up to 1m over part or possibly all of the area of the sediment pond), and the intention to consult closely with GW while preparing the Erosion and Sediment Control Plan. The assessment of effects for this additional subsidiary consent should be considered as part of the consents for the intended quarry operation as a whole, and described in relation to the AEEs provided in association with the other consent applications.

Bullet point 3 - Our notes (and review of client notes) from early meetings indicate that this was advised. Your note provides new information to us. However, we do not consider that to be an issue. It is not intended to make continuous use of wash water, as only approximately one third of production is likely to require washing (material to be used for concrete aggregates and sealing chip). There will be various means of managing the timing and duration of washing, and a condition as suggested could be worked around.

Bullet point 4 - The stormwater pond (and other sediment control methods) will be sized and designed taking into account design rainfall events, and will be subject to GW review. Preliminary designs and description provided have been based on GW's Erosion and Sediment Control Guidelines for the Wellington Region. It is important to note that runoff from the site is not "contaminated" in the normal sense of the word.

Bullet point 5 - Our understanding of the condition you refer to is that the "network" referred to is the natural drainage network, not the water race. It is not possible to separate out the wash water from the normal site drainage following treatment, and even if this was possible, the water race is at a higher level than the sediment treatment pond and would require pumping.

### Quarry Management Plan

- **1.3.2 Existing fill please note "wood" is not Cleanfill**
- **1.3.3 "There is no indication that the tip contains any potential contaminants – but it contains wood?"**
- **1.3.4 Reference to 6m deep exploration pits – haven't these provided information on g/w levels?**



- **1.3.5 The site does not intercept any surface water course ??what about spring**
  - *Existing quarry floor is at or near g/w level ( summer or winter?)*
  - *Water leaving site appears to be clean.. has any water quality testing been done (could reveal contaminants that cannot be seen)*
  
- **2.2.4 Extraction limit set at just above water table at 124m elevation – on what basis is this considered to be sufficient to not intercept water table in winter? What precautions will be taken to ensure winter water table is not intercepted – will machinery be at this level – serious risk of contamination of g/w if water level rises over operating machinery – oil spills etc**
  - *“the mobile screening, crushing and washing plant will always be located on the floor of the excavation” so there is still a risk of contamination of groundwater even if water table is not intercepted – what is to be done to minimise risk of engine oil spillages etc.*
  - *60% open quarry limitation by legal document with Kiwi Lumber– however this is not sufficient to mitigate dust and erosion potential – in fact we consider size of areas exposed should not be more than 0.5 hectares at any one time – site is exposed to very strong winds and heavy rain in winter therefore need to minimise exposed surfaces.*
  
- **3.3 – mentions spraying water in dry and windy conditions – will need an awful lot of water if size of area exposed is not limited – how are the “large volume of water” to be maintained on site**

Bullet point 1 - Your comment relates to a descriptive paragraph covering history and ownership of the site, and what is currently on the site. The writer has noted that there is a small pile of fill which appears to contain some random stray pieces of wood (from memory possibly old fence posts or tree branches). The writer has viewed the material and advises that he considers it to be clean. By reference to the MfE guidelines, untreated natural timber can in some circumstances be accepted at cleanfills, the main aspect of concern appearing to be that timber does rot out over time and may lead to subsidence. In this case, what is being described will be “cleaned up” as part of the overall operation.

- See comments above
- The reference here is to the gravel resource, in the context of the site's geology, not groundwater levels.

Bullet point 4 - As noted above the spring is outside the working area, and so there is no interception of any surface water course.

- The comment about ground-water level is correct to the best of our understanding in terms of the winter groundwater level. The quarry management plan was written prior to the availability of the bore information, and we have no reason to alter this understanding.
- No water quality testing has been done and there is no reason to expect the groundwater to be contaminated in the area being described.

Bullet point 5 - Bore information has been provided, and a monitoring bore is to stay in place for the duration of the quarry operation. We would expect a condition that required no excavation below the level of the water table. As you will be aware, there is an agreement with the landowner to restore the site to a level at least 0.5m above the water table. In terms of management of the site and any risk of oil spillages, Wairarapa Aggregates has an environmental management policy and on-site operating practices which effectively manage such risks on several existing sites. A specific plan and similar practices would be applied to this site.

- See comment above.
- We disagree with the suggestion that dust cannot be effectively managed on a site greater than 0.5 hectares. There are numerous large quarries on large, steep and windy sites, and other aggregate storage and management sites which effectively manage dust (including sites operated by Wairarapa Aggregates). The quarry management plan sets out the means of mitigating adverse effects and the intended staging of the development of the quarry. Wairarapa Aggregates would not accept a limitation along the lines suggested in your note. However, it would expect that a range of reasonable conditions would be attached to consents.
- One means of dust management is the use of water spraying in windy conditions. This is by means of a water cart (or carts). Carts will be filled from the site's water supply (subject of an application) and retained in readiness for use.

#### Erosion and Sediment Control Plan

- ***Appendix A has not been updated to show that no extraction is planned below g/w level***
- ***1.3 "Quarry run-off will be controlled by a sediment control pond excavated below the current quarry floor level of 124m, into the water table." In other words this will be a well for which a bore permit is required! Is it necessary to excavate into the water table and if so how is g/w water quality to be maintained? "small area of wetland and some drains" actually there is a spring with very clean water which should be preserved***
- ***Excavation in 3 stages – this is not sufficient restriction of size of area exposed at any one time as stated above***
- ***Truck Wash and filtration system – no mention of how contaminants from truckwash will be kept from entering waterways***

Bullet point 1 - We apologise for attaching an earlier version on the plan in Appendix A. Please replace GE01 Rev B with GE01 Rev D. A copy of plan GE01 Rev D is enclosed at A1 and A3. Correct copies have also been sent to Carterton District Council.

Bullet point 2 - The extent of excavation is discussed above (see bullet-point 2, Water take application comments), and an application form is attached. It is not a well, as you suggest. The sediment pond will be subject to specific design. It is to settle water and sediment from the site and from on site washing operations, and will not contain any contaminants or additives from processing. The comments which follow in your note appear to be based on an expectation of poor practice by the applicant, and is not justified, along with a misunderstanding of the location of the spring and its relationship with site drainage.

Bullet point 3 - See comment above (under bullet-point 5, re quarry management plan). Appropriate management and restoration of completed surfaces will be undertaken.

Bullet point 4 A truck wheel-wash area is shown on the quarry management plan. Water from this facility is directed to the main sediment pond.





### **Additional Comment on Erosion and Sediment Control Plan**

In discussion with Al Cross about the application, he has advised that GW does not now favour large sediment ponds out of a concern about wave action disturbing sediment within the ponds. This appears to be a recent concern based on recent experience. In discussion, it may be preferable to slightly reduce the size of the permanent pond, and use a mix of a larger permanent pond and one or more temporary moveable ponds near the working area. There may also be benefits in having two stages of sediment control structures in terms of cleaning out the larger pond. Our engineers have suggested that, in addition or alternatively, any wave action issues could be addressed by surface baffles on the pond.

The applicant expects that GW would apply a condition relating to finalisation of the erosion control and sediment management plan, and that these types of issues would be worked through with GW within the conditions of consent. It is our understanding and experience that the current level of information is in accordance with, or in excess of, normal practice at application stage.

### **Plans**

At your request, a set of A1 scale plans is enclosed. These have been updated and include:

**Discharge Permit – GE01 Rev D Proposed Excavation Limits and Water Management Plan Figure 3**  
**Appendix D – Sediment and Erosion Control Plan – GE01 Rev D Proposed Excavation Limits and Water Management Plan Figure 3**

**Quarry Management Plan - November 2008**  
**Appendix A – Proposed Extraction Limit & Water Management Plan**  
GE01 Rev D replaces GE01 Rev B

Sheet C01 Rev A Erosion and Sediment Control Plan Proposed Stage 1 Excavation Limits  
Sheet C02 Rev A Erosion and Sediment Control Plan Proposed Stage 2 Excavation Limits  
Sheet C03 Rev A Erosion and Sediment Control Plan Proposed Stage 3 Excavation Limits

Sheet C04 Rev A Erosion and Sediment Control Plan Concept Sediment Pond Design  
Sheet C05 Rev A Erosion and Sediment Control Plan Concept Sediment Pond Design – Long Section

### **Site Visit**

As discussed, Robert Nyssen would be happy to arrange a site visit for you. He will let you know when he is likely to be next in the area. Please advise me when you would like to have a site visit, so we can co-ordinate

Yours sincerely

Sylvia Allan  
**National Planning Team Leader**  
**MWH New Zealand Limited**



Encl.: Plans  
Form 9

Copy to: Alistair Cross, Greater Wellington Regional Council PO Box 11646, Wellington  
Robert Nyssen, Nyssen Business Consultancy, 38 Tremaine Avenue, Taupo

**Resource Management Act 1991  
Application for Resource Consent**

To: Greater Wellington Regional Council  
PO Box 41  
Masterton 5810

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Office Use: L.U. No.....  
Date Received.....

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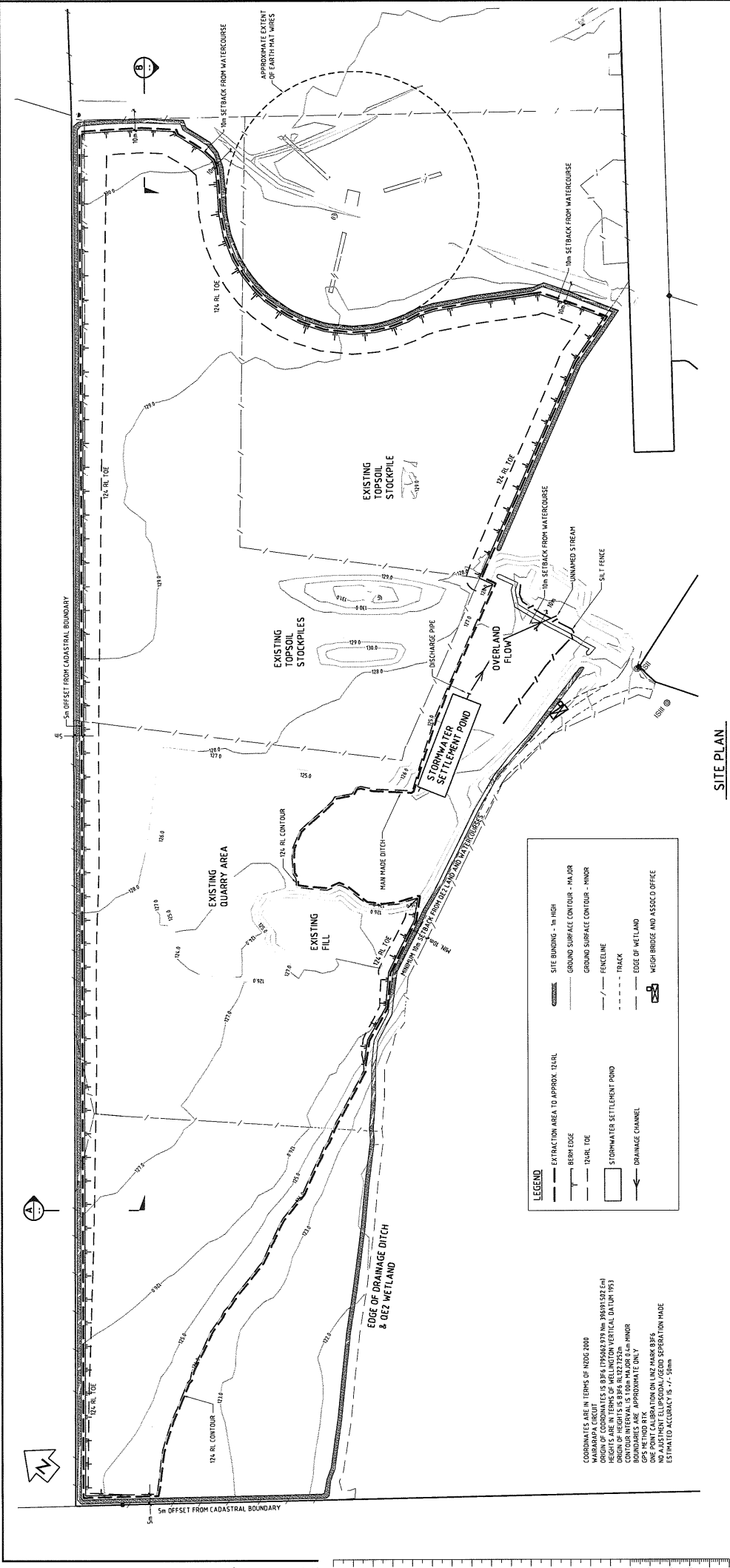
Wairarapa Aggregates  
C/- MWH New Zealand Ltd  
Level 1, 123 Taranaki Street,  
P O Box 9624, Te Aro  
WELLINGTON

Apply for the resource consent described below:

1. The owners of the site are: Kiwi Lumber (Masterton) Ltd
2. The location to which the application relates is as follows
  - (i) Kiwi Lumber site, Norman Avenue, Wainawa, Masterton
  - (ii) Legal Description: Lot 3 DP383510 Certificate of Title 168187
  - (iii) Total Area: 11.6 ha
3. The type of resource consent sought is a land use consent "to construct or alter a bore" as required by Rule 15 of the Regional Freshwater Plan, as described below and further described in detail in the associated resource consents and letter dated 28<sup>th</sup> January 2009. Please note that the activity is of a different nature, as described below, from the rule that triggers the need for the consent.
4. A description of the activity to which the application relates:
  1. To construct operate and maintain a permanent settlement pond
  2. To construct, operate and maintain temporary 'sumps' for the settlement out of larger sediment as part of the aggregate washing process near to the working area, the location of which will change depending on the location of the processing plant.
  3. To allow for the construction, operation and maintenance of smaller temporary settlement ponds in and near to the working area as suggested by Greater Wellington.





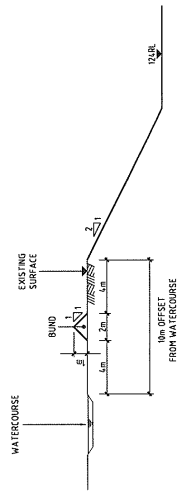


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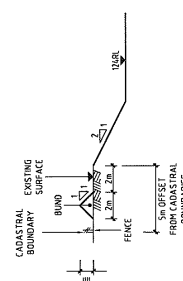
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[Symbol]	BERM EDGE	[Symbol]	GROUND SURFACE CONTOUR - MAJOR
[Symbol]	12A RL TOE	[Symbol]	GROUND SURFACE CONTOUR - MINOR
[Symbol]	STORMWATER SETTLEMENT POND	[Symbol]	FENCE LINE
[Symbol]	DRAINAGE CHANNEL	[Symbol]	TRACK
[Symbol]		[Symbol]	EDGE OF WETLAND
[Symbol]		[Symbol]	WEIGH BRIDGE AND ASSO. OFFICE

COORDINATES ARE IN TERMS OF NZGD 2000  
 ORIGIN OF COORDINATES IS BFM4 (799642.979 N; 398931.502 E)m  
 HEIGHTS ARE IN TERMS OF WELLINGTON VERTICAL DATUM 1953  
 CONTOUR INTERVALS FOR MAJOR & MINOR  
 BOUNDARIES ARE APPROXIMATE ONLY  
 GPS METHOD USED  
 NO ADJUSTMENT FOR REFRACTION OR ATMOSPHERIC REFRACTION MADE  
 ESTIMATED ACCURACY IS +/- 50mm



**TYPICAL DETAIL B - EXCAVATION SLOPES ADJACENT TO WATERFEATURES**  
SCALE 1: 200



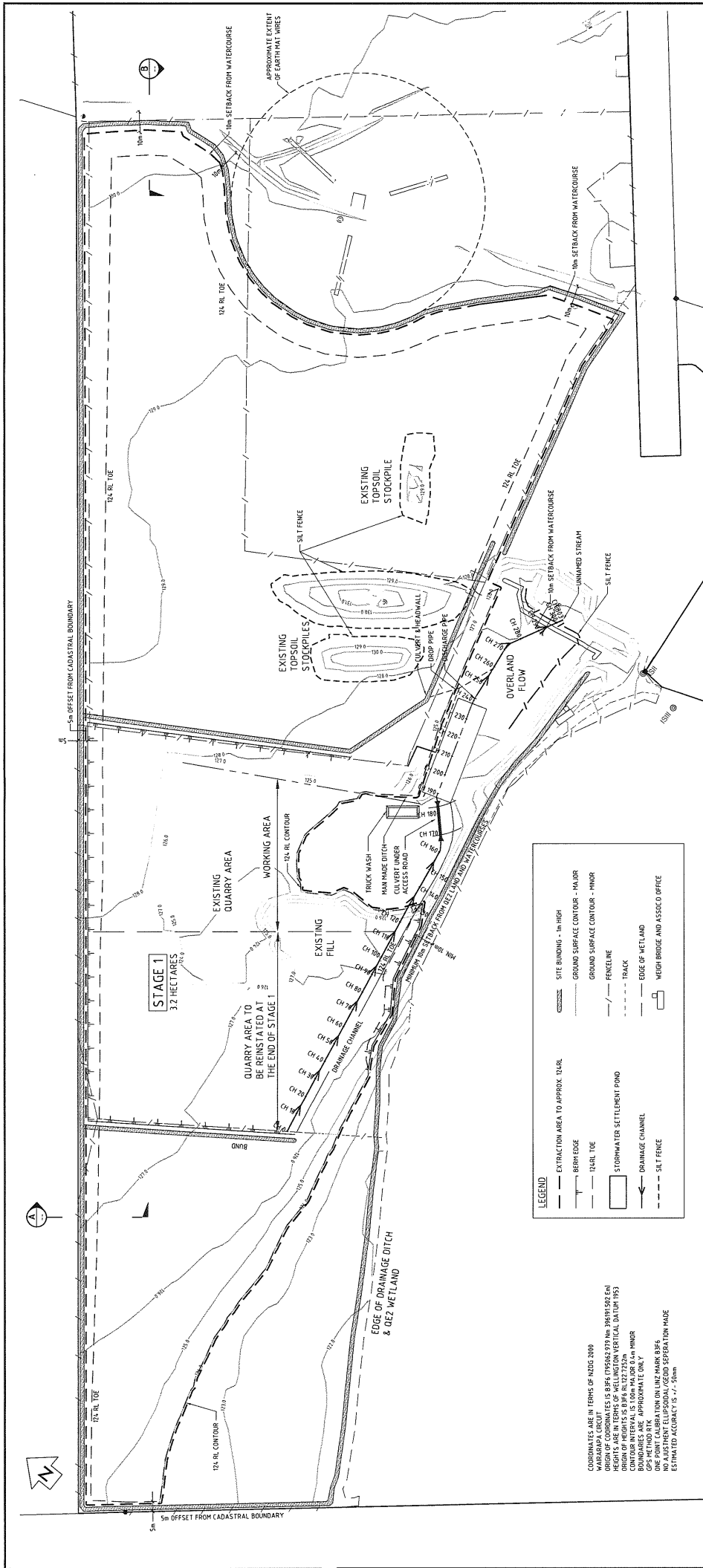
**TYPICAL DETAIL A - EXCAVATION SLOPES ADJACENT TO CADASTRAL BOUNDARIES**  
SCALE 1: 200

SURVEYED		Name		Date	
DESIGNED	R. DILLON	AMB		11/07	
DESIGN CHECK	J. CHANDLER			01/08	
DRAWN				01/08	
DRAWING CHECK					
APPROVED					

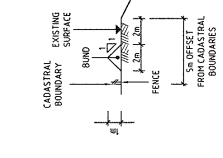
MAIRARAPA AGRAGGREGATES KIMI LUMBER SITE		NOT FOR CONSTRUCTION	
FOR REVIEW		Drawn Date	19/05/2008
PROPOSED EXCAVATION LIMITS & WATER MANAGEMENT PLAN FIGURE 3		Scales (A1) 1:1000 (A3) 1:2000	
MWH		Drawn No.	Z144.9801
REV		Rev	D

COPYRIGHT © This drawing shall not be used for the purposes for which they were prepared. May not be reproduced or distributed without the written permission of MWH NZ Ltd. XREFS: X\_...Kimi Lumber site survey, X\_Medi\_Drupal\_Survey5Surf, X\_...Typical Detail

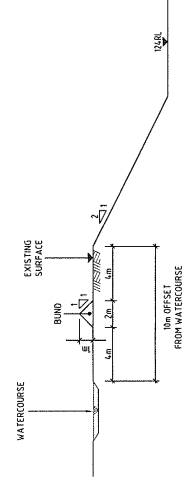


- NOTES:**
- SILT FENCES TO BE OF CUT FACES, REFER GWRC EASC GUIDELINES
  - SILT FENCES TO SURROUND NEW TOPSOIL STOCKPILES
  - SEPARATE CURBS ARE REQUIRED FOR TRUCKS, QUARRY PROCESSING, SEPARATED FROM THE MAIN STORMWATER SETTLEMENT POND. REFER TO QUARRY MANAGEMENT PLAN FOR DIMENSIONS.
  - MINIMUM SEDIMENT POND VOLUME 640m<sup>3</sup> FOR STAGE 1

**SITE PLAN**  
SCALE 1:1000



**TYPICAL DETAIL A - EXCAVATION SLOPES ADJACENT TO CADASTRAL BOUNDARIES**  
SCALE 1:200



**TYPICAL DETAIL B - EXCAVATION SLOPES ADJACENT TO WATERFEATURES**  
SCALE 1:200

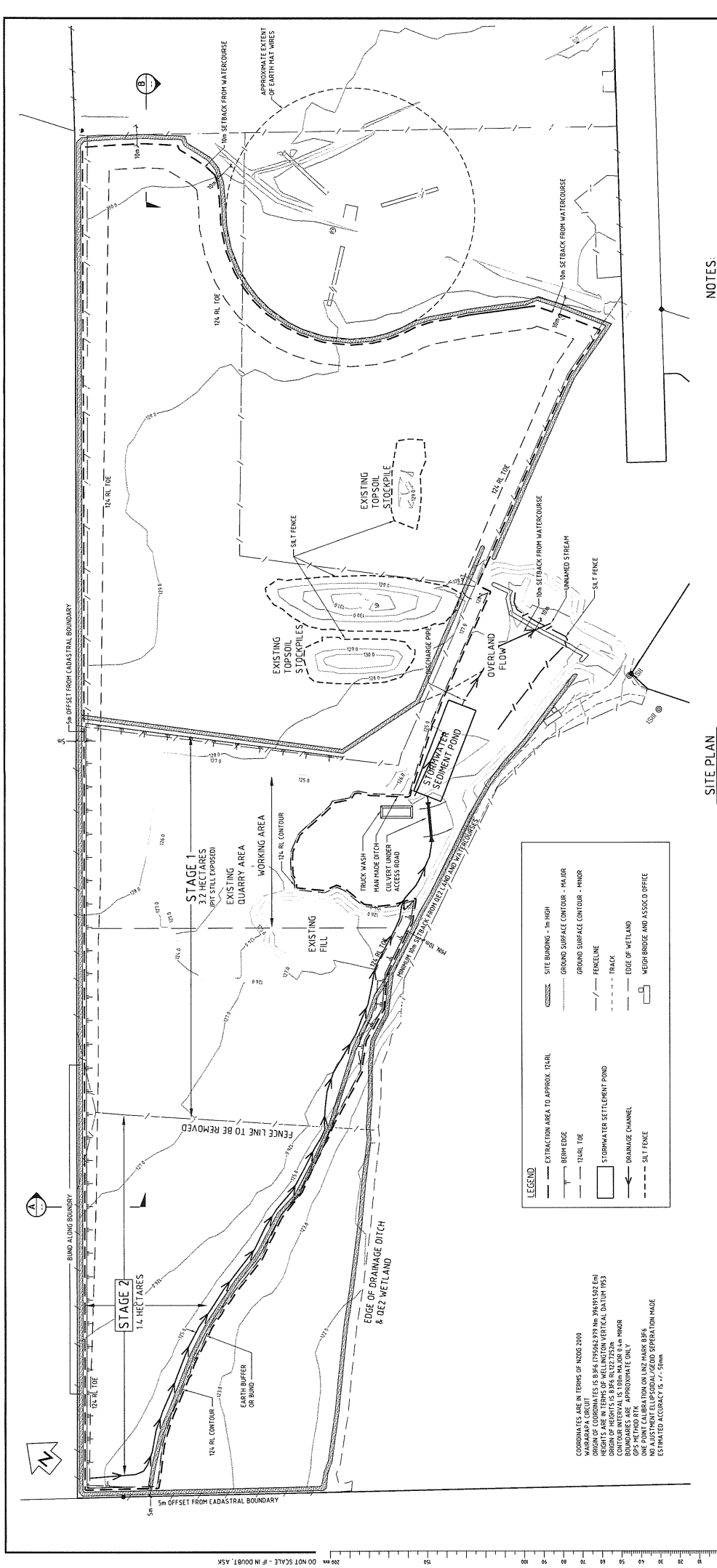
**LEGEND**

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	GROUND SURFACE CONTOUR - MAJOR
	GROUND SURFACE CONTOUR - MINOR
	FENCE LINE
	TRACK
	STORMWATER SETTLEMENT POND
	DRAINAGE CHANNEL
	SILT FENCE
	EDGE OF WETLAND AND ASSOC'D OFFSET

COORDINATES ARE IN TERMS OF NZGD 2000  
 WAIRARAPA CIRCUIT  
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 BOUNDARIES ARE APPROXIMATE ONLY  
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 NO ADJUSTMENT ELIPSOIDAL/GEOID SEPARATION MADE  
 ESTIMATED ACCURACY IS +/- 5mm

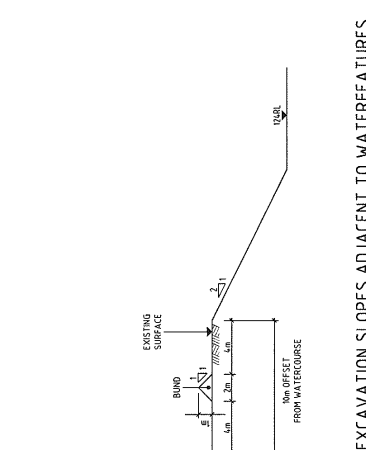
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Date Issued	28/01/2009	Date	28/01/2009
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Drawn	C01	Rev.	A
<b>WAIRARAPA AGGREGATES KIWI LUMBER SITE</b>			
<b>EROSION &amp; SEDIMENT CONTROL PLAN PROPOSED STAGE 1 EXCAVATION LIMITS</b>			
		Name	Date
		Name	Date
SURVEYED	R. WATERS	11/07	
DESIGNED	N. REEDMAN	11/08	
DESIGN CHECK	J. MITCHELL	11/08	
DRAWN	N. REEDMAN	11/08	
DRAWING CHECK	N. REEDMAN	11/08	
APPROVED	S. ALLAN	01/09	
REV	DESCRIPTION	DATE	
A	FOR CONSENT		

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**SITE PLAN**  
SCALE 1:1000

**TYPICAL DETAIL A - EXCAVATION SLOPES ADJACENT TO CADASTRAL BOUNDARIES**  
SCALE 1:1: 200



**TYPICAL DETAIL B - EXCAVATION SLOPES ADJACENT TO WATERFEATURES**  
SCALE 1:1: 200



REVISIONS		DATE		NAME	
A	FOR CONSENT	11/07	NMB	11/07	R WATERS
B	FOR CONSENT	11/08	N REEMAN	11/08	N REEMAN
C	FOR CONSENT	11/08	J HICHELL	11/08	J HICHELL
D	FOR CONSENT	11/08	N REEMAN	11/08	N REEMAN
E	FOR CONSENT	01/09	S ALLAN	01/09	S ALLAN

DESIGNED	11/07	R WATERS
DESIGN CHECK	11/08	N REEMAN
DRAWN	11/08	J HICHELL
DRAWING CHECK	11/08	N REEMAN
APPROVED	01/09	S ALLAN

DATE	28/01/2009
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REV.	C02
REV. NO.	A

**NOT FOR CONSTRUCTION**

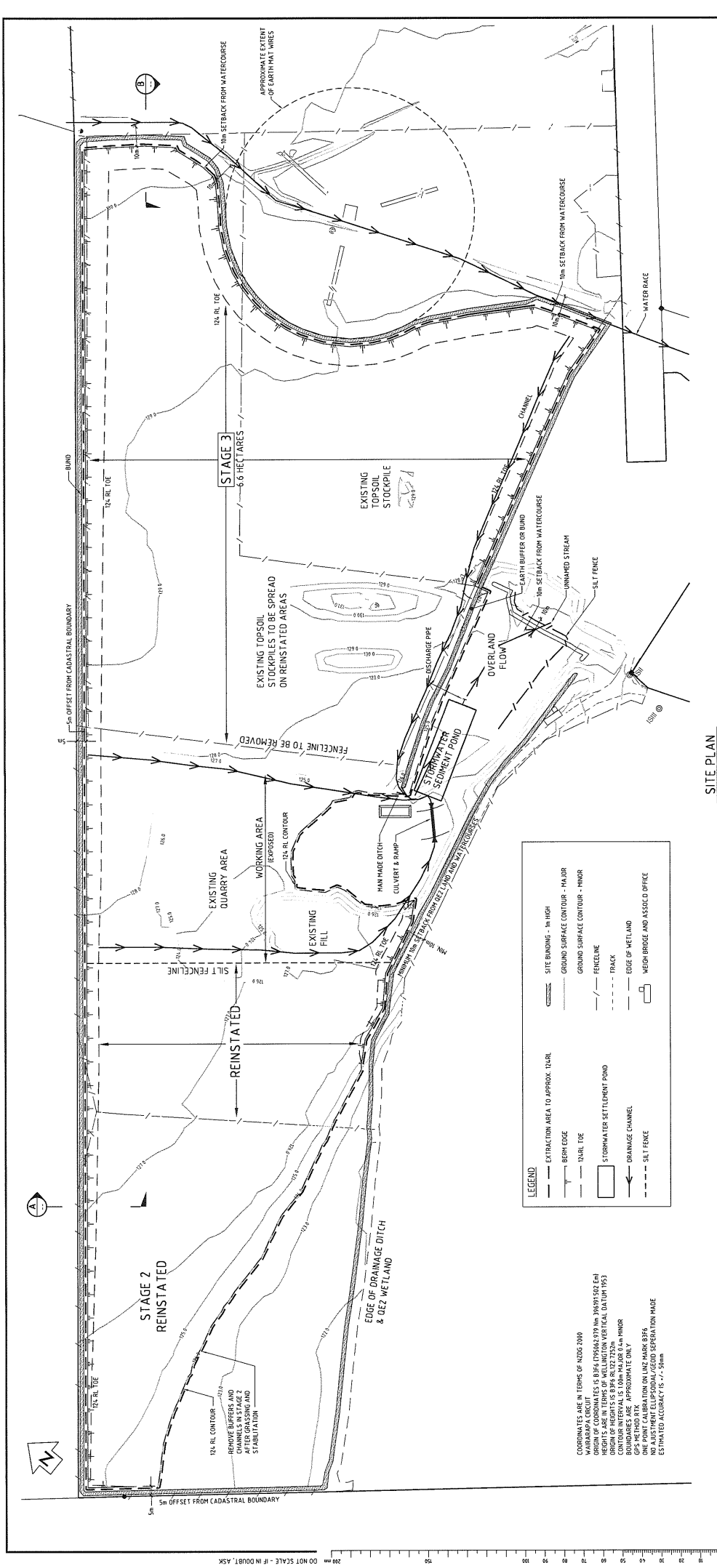
WAIARAPA AGGREGATES  
KIWI LUMBER SITE  
EROSION & SEDIMENT CONTROL PLAN  
PROPOSED STAGE 2 EXCAVATION LIMITS

**MWH**

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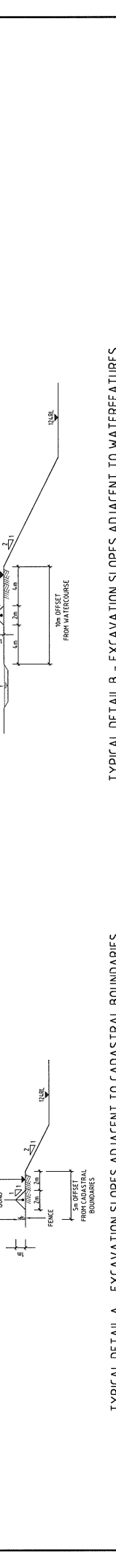
REVISED SURFACE X<sub>1</sub> New Lumber site survey, X<sub>2</sub> Mast<sub>1</sub> Dripul<sub>1</sub> Survey Surface, X<sub>3</sub> Typical Ditch





**NOTES:**

1. REINSTATE FINAL LEVELS IN STAGES 1, 2 & 3 WITH TOPSOIL
2. SILT FENCES TO TOE OF CUT FACES. REFER GWRE EXCISE GUIDELINES
3. SILT FENCES TO SURROUND NEW TOPSOIL STOCKPILES
4. SEPARATE SUMPS ARE REQUIRED FOR RIM-OF-BOUNDARY POND. REFER TO QUARRY MANAGEMENT PLAN FOR DIMENSIONS.
5. MINIMUM SEDIMENT POND VOLUME 1500m<sup>3</sup> FOR STAGE 3



**TYPICAL DETAIL A - EXCAVATION SLOPES ADJACENT TO CADASTRAL BOUNDARIES.** SCALE 1 : 200

**TYPICAL DETAIL B - EXCAVATION SLOPES ADJACENT TO WATERFEATURES.** SCALE 1 : 200

REV	DATE	BY	CHKD	APP'D	DESCRIPTION
A	18/02/22	SJA			FOR CONSENT
B	11/07	RWA			DESIGNED
C	11/08	MKE			DESIGN CHECK
D	11/08	JTC			DRAWN
E	11/08	MKE			DRAWING CHECK
F	01/09	SJA			APPROVED

**REVISIONS**

REV	DATE	BY	CHKD	APP'D	DESCRIPTION
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B	11/08	MKE			DESIGNED
C	11/08	JTC			DESIGN CHECK
D	11/08	MKE			DRAWN
E	11/08	MKE			DRAWING CHECK
F	01/09	SJA			APPROVED

**WAIARAPA AGGREGATES  
KIWI LUMBER SITE**

**EROSION & SEDIMENT CONTROL PLAN  
PROPOSED STAGE 3 EXCAVATION LIMITS**

**MWH**

**FOR CONSENT**

Date: 28/01/2009

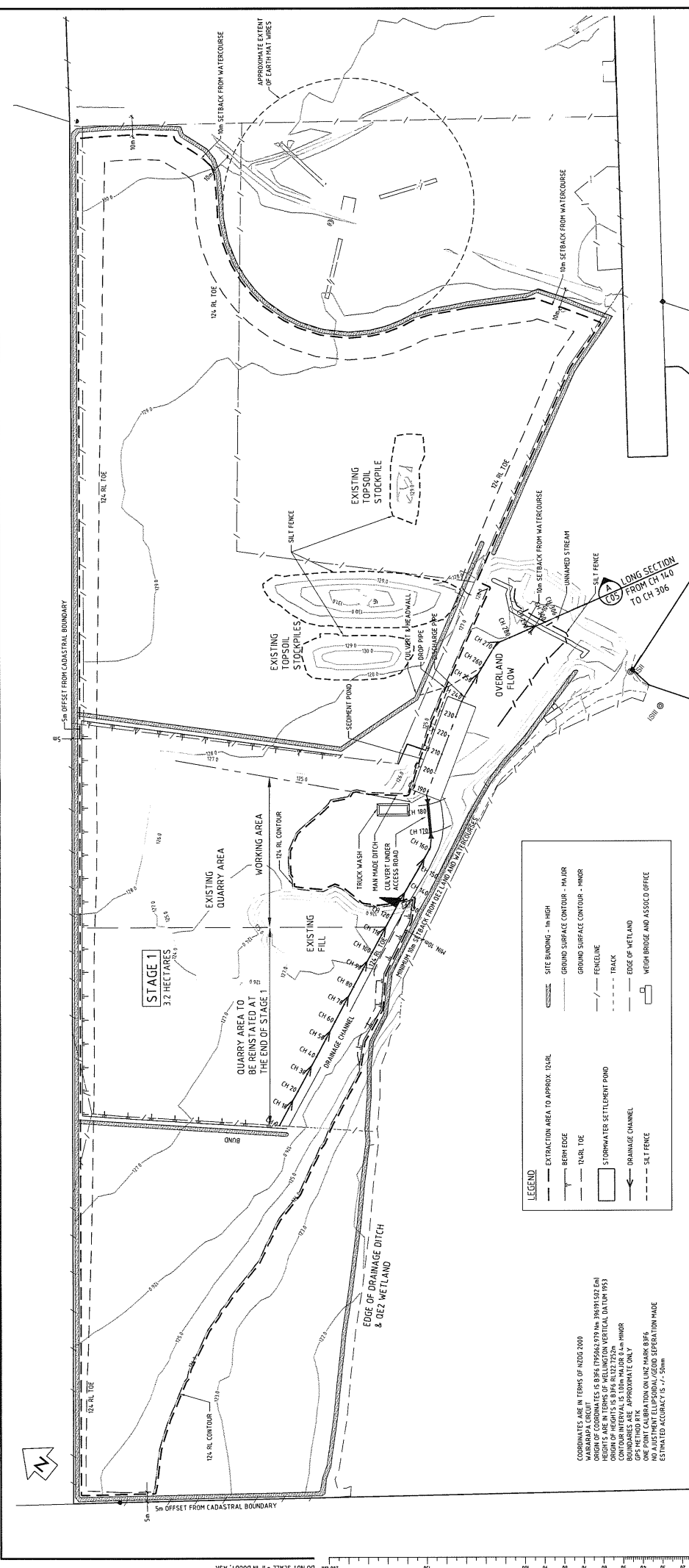
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Drawn By: Z144.9801

Checked By: C03

Rev: A

Project Path: \\nz\highlight\project\312400\03\2108\Wairapa Aggregates\210803\Kiwi Lumber Site\CAD (Copied from 0312449801\_C03.dwg)



**SITE PLAN**  
SCALE 1:1000

COORDINATES ARE IN TERMS OF NZGD 2000  
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 CONTOUR INTERVALS: 1.0m MAJOR & 0.5m MINOR  
 BOUNDARIES ARE APPROXIMATE ONLY  
 ONE POINT CALIBRATION ON LZ2 MARK B365  
 AND A JUSTMENT ELLIPSOIDAL/GEOID SEPARATION MADE  
 ESTIMATED ACCURACY IS +/- 50mm

**NOT FOR CONSTRUCTION**

DATE: 28/01/2009  
 DRAWN: Z1449801  
 SHEET No: C04  
 REV: A

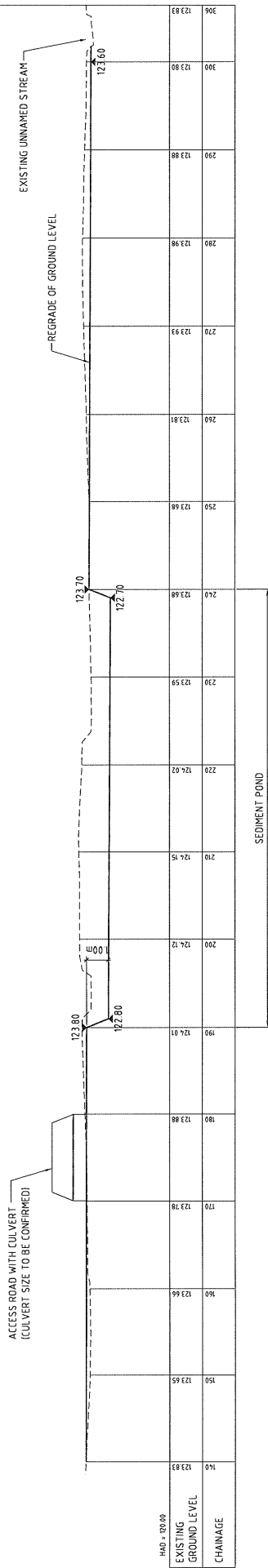
WAIRARAPA AGGREGATES  
 KIWI LUMBER SITE  
 EROSION & SEDIMENT CONTROL PLAN  
 CONCEPT SEDIMENT POND DESIGN



Name	Date
NHB	11/07
R WATERS	01/09
M KEEMAN	01/09
J HUNT	01/09
M KEEMAN	01/09
S ALLAN	01/09

REVISIONS	DATE	APPROVED	DRAWN	CHECKED
A FOR CONSENT	28/01/09	SJA	NJK	NJK



SECTION A DRAINAGE CHANNEL (CH 14.0 TO CH 30.6)  
 CO4 SCALES - H 1 : 250  
 V 1 : 100

NOTES

- EXCAVATION TO BE BACKFILLED WITH CLEAN EXISTING MATERIAL OR SIMILAR APPROVED.
- DESIGN IS CONCEPT ONLY. ALL LEVELS AND POND SIZES WILL BE CONFIRMED IN DETAILED DESIGN.
- REFER TO DRAWING CO4 FOR POND LOCATION.

**NOT FOR CONSTRUCTION**

<b>WAIKARAPA AGGREGATES KIWI LUMBER SITE</b>		<b>FOR CONSENT</b>	
		28/01/2009	
		28/01/2009	
		Z144.9801	
		C05	
		A	

**WAIKARAPA AGGREGATES  
KIWI LUMBER SITE**

**EROSION & SEDIMENT CONTROL PLAN  
CONCEPT SEDIMENT POND DESIGN - LONG SECTION**

REV	DATE	BY	CHKD	APP'D	DESCRIPTION
1	01/09	S. ALLAN			APPROVED
2	01/09	N. KEEMAN			DRAWING CHECK
3	01/09	G. LOWE			DRAWN
4	01/09	N. KEEMAN			DESIGN CHECK
5	01/09	R. WATERS			DESIGNED
6	01/09				SURVEYED

**MWH**

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REFS:

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