

# Stripping and Grading Plan

**Mountain Ash Limited Partnership Summit Pit**

SLR Project No: 212.06650.00006

April 2021



## Stripping and Grading Plan

Mountain Ash Limited Partnership

Rocky View County, Alberta

SLR Project No: 212.06650.00006

Prepared by:

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April 2021

This document has been prepared by SLR Canada. The material and data in this report were prepared under the supervision and direction of the undersigned.

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Distribution: 1 copy (PDF) – Mountain Ash Limited Partnership  
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## Table of Contents

1.0	INTRODUCTION .....	1
2.0	STRIPPING AND GRADING ACTIVITIES .....	1
3.0	QUANTITIES .....	1
4.0	STATEMENT OF LIMITATIONS.....	2

## TABLES

Table 1	Quantities of Non-Mineral Materials to be Stripped .....	1
Table 2	Quantities of Materials used to Reclaim Site Post Mining .....	2

## DRAWINGS

Drawing 1:	Overall Working Progression
Drawing 2:	Site Grading – Following Reclamation
Drawing 3:	Cross Sections

## 1.0 INTRODUCTION

Mountain Ash Limited Partnership (Mountain Ash) is planning to develop the Summit Pit (the Project) along Highway 567 within NW and SW 31-026-03 W5M, northeast of the Town of Cochrane, in Rocky View County (RVC), Alberta (Figure 1). The Project will encompass approximately 208 acres (84 ha) excluding existing road rights-of-way. Mountain Ash is applying for Phase 1 of a six-phase mining plan. This land is currently owned by 1410266 Alberta Ltd. (a general partner of Mountain Ash). Summit Pit received land use and a master site development plan (MSDP) approval on March 2, 2021 (Land Use Bylaw C-8051-2020).

## 2.0 STRIPPING AND GRADING ACTIVITIES

The portion of the pit to be used shall be cleared and grubbed, and the area from which materials are to be taken shall be stripped of topsoil and overburden as provided in Section 3 and outlined in the soil conservation and reclamation plan. Stripping at the site shall consist of the removal, after clearing and grubbing, of the surface material and overburden which is unsuitable for the kind of material to be borrowed or produced for use. Materials from stripping, to be used later as provided on the site reclamation plan, shall be deposited within the pit at such a location as not to interfere with future development within the site.

Before placing aggregates upon the stockpile site, the site shall be cleared of vegetation, trees, stumps, brush, rocks, or other debris and the ground leveled to a smooth, firm, uniform surface. The debris resulting from clearing and preparing the site shall be disposed of according to the vegetation and soil management plan and outlined in Bylaw C-8051-2020.

All Stripping and grading activities will follow Bylaw C-8051-2020 as issued and commitments made under the visual screening plan, erosion and sedimentation control plan and the Soils Conservation plan.

## 3.0 QUANTITIES

**Table 1 Quantities of Non-Mineral Materials to be Stripped**

Phase	Surface Area	Topsoil	Subsoil	Overburden	Total	Average Overburden Thickness
1	138,958 m <sup>2</sup>	34,740 m <sup>3</sup>	27,792 m <sup>3</sup>	322,182 m <sup>3</sup>	384,714 m <sup>3</sup>	2.32 m
2	151,950 m <sup>2</sup>	37,987 m <sup>3</sup>	30,390 m <sup>3</sup>	503,843 m <sup>3</sup>	572,220 m <sup>3</sup>	3.32 m
3	152,053 m <sup>2</sup>	38,013 m <sup>3</sup>	30,411 m <sup>3</sup>	747,321 m <sup>3</sup>	815,744 m <sup>3</sup>	4.91 m
4	116,958 m <sup>2</sup>	29,239 m <sup>3</sup>	23,392 m <sup>3</sup>	396,206 m <sup>3</sup>	448,837 m <sup>3</sup>	3.39 m
5	159,617 m <sup>2</sup>	39,904 m <sup>3</sup>	31,923 m <sup>3</sup>	418,809 m <sup>3</sup>	490,637 m <sup>3</sup>	2.62 m
6	84,179 m <sup>2</sup>	21,045 m <sup>3</sup>	16,836 m <sup>3</sup>	333,627 m <sup>3</sup>	371,507 m <sup>3</sup>	3.96 m
<b>Total</b>	<b>803,715 m<sup>2</sup></b>	<b>200,929 m<sup>3</sup></b>	<b>160,743 m<sup>3</sup></b>	<b>2,721,988 m<sup>3</sup></b>	<b>3,083,660 m<sup>3</sup></b>	<b>3.39 m</b>

**Table 2 Quantities of Materials used to Reclaim Site Post Mining**

Phase	Surface Area	Topsoil	Subsoil	Overburden & Rejects (@15% Gravel)	Total
1	138,250 m <sup>2</sup>	34,562 m <sup>3</sup>	27,650 m <sup>3</sup>	1,771,835 m <sup>3</sup>	1,834,047 m <sup>3</sup>
2	152,319 m <sup>2</sup>	38,080 m <sup>3</sup>	30,464 m <sup>3</sup>	433,853 m <sup>3</sup>	502,396 m <sup>3</sup>
3	152,783 m <sup>2</sup>	38,196 m <sup>3</sup>	30,557 m <sup>3</sup>	908,427 m <sup>3</sup>	977,180 m <sup>3</sup>
4	117,069 m <sup>2</sup>	29,267 m <sup>3</sup>	23,414 m <sup>3</sup>	476,242 m <sup>3</sup>	528,923 m <sup>3</sup>
5	159,401 m <sup>2</sup>	39,850 m <sup>3</sup>	31,880 m <sup>3</sup>	349,914 m <sup>3</sup>	421,644 m <sup>3</sup>
6	83,687 m <sup>2</sup>	20,922 m <sup>3</sup>	16,737 m <sup>3</sup>	284,330 m <sup>3</sup>	321,989 m <sup>3</sup>
<b>Total</b>	<b>803,509 m<sup>2</sup></b>	<b>200,877 m<sup>3</sup></b>	<b>160,702 m<sup>3</sup></b>	<b>4,224,601 m<sup>3</sup></b>	<b>4,586,180 m<sup>3</sup></b>

## 4.0 STATEMENT OF LIMITATIONS

This report has been prepared and the work referred to in this report has been undertaken by SLR for Mountain Ash Limited Partnership., hereafter referred to as the “Client”. The report has been prepared in accordance with the Scope of Work and agreement between SLR and the Client. It is intended for the sole and exclusive use of the Client. Other than by the Client and as set out herein, copying or distribution of this report or use of or reliance on the information contained herein, in whole or in part, is not permitted without the express written permission of SLR.

This report has been prepared for specific application to this site and site conditions existing at the time work for the report was completed. Any conclusions or recommendations made in this report reflect SLR’s professional opinion.

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Nothing in this report is intended to constitute or provide a legal opinion. SLR makes no representation as to the requirements of compliance with environmental laws, rules, regulations, or policies established by federal, provincial, or local government bodies. Revisions to the regulatory standards referred to in this report may be expected over time. As a result, modifications to the findings, conclusions, and recommendations in this report may be necessary.

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 **DRAWINGS**

**Stripping and Grading Plan**  
Mountain Ash Limited Partnership  
Summit Pit  
**SLR Project No: 212.06650.00006**

SG01\_OVERALL PHASING.dwg



**NOTES**

THIS PLAN SHOWS THE GENERAL ORDER OF WORKING, WITH MINING BLOCKS PROGRESSING IN AN ANTICLOCKWISE DIRECTION FROM THE SOUTH EAST.

EACH MINING BLOCK WILL BE NO GREATER THAN 150m X 150m (22,500m<sup>2</sup>).

**LEGEND**

	EXTRACTION PHASE BOUNDARY
	MINING BLOCK - SHOWING INDICATIVE PROGRESSION
	LEGAL BOUNDARIES
	OVERBURDEN / SOIL STORAGE
	ACCESS ROAD

STOCKPILES OF TOPSOIL, SUBSOIL, AND OVERBURDEN DURING INITIAL WORKING PERIOD PRIOR TO DIRECT PLACEMENT RECLAMATION

MOUNTAIN ASH LIMITED PARTNERSHIP.  
 SUMMIT AGGREGATES RESOURCE  
 W 1/2 SEC 31 TWP 026 RGE 03 W5M  
 COCHRANE  
 ALBERTA

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**STRIPPING & GRADING**

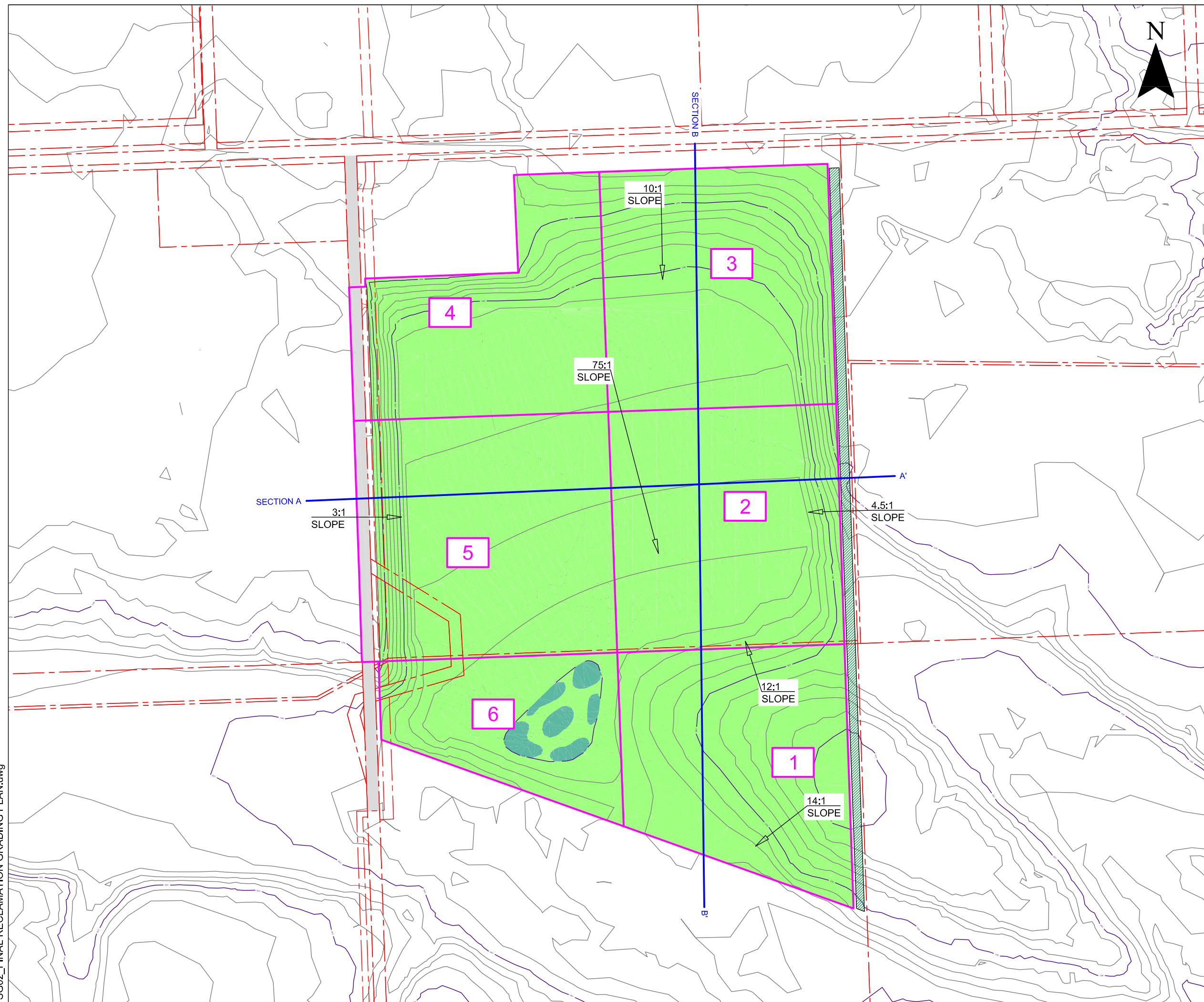
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**OVERALL WORKING PROGRESSION**

**01**

Scale 1:6,000 @ A3 Date APR 2021

SG02\_FINAL RECLAMATION GRADING PLAN.dwg



**NOTES**

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EACH MINING BLOCK WILL BE NO GREATER THAN 150m X 150m (22,500m<sup>2</sup>).

**LEGEND**

	EXTRACTION PHASE BOUNDARY
	RECLAIMED AREA
	REINSTATED WETLAND AREA
	LEGAL BOUNDARIES
	RANGE ROAD 40
	GRADING OF RECLAIMED LAND (HORIZONTAL : VERTICAL RATIO)
	LINE OF CROSS SECTION (SEE DRAWING 03)

MOUNTAIN ASH LIMITED PARTNERSHIP.  
 SUMMIT AGGREGATES RESOURCE  
 W 1/2 SEC 31 TWP 026 RGE 03 W5M  
 COCHRANE  
 ALBERTA

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



STRIPPING & GRADING  
 212.06650.00006  
**RECLAIMED LAND - GRADING**  
**02**

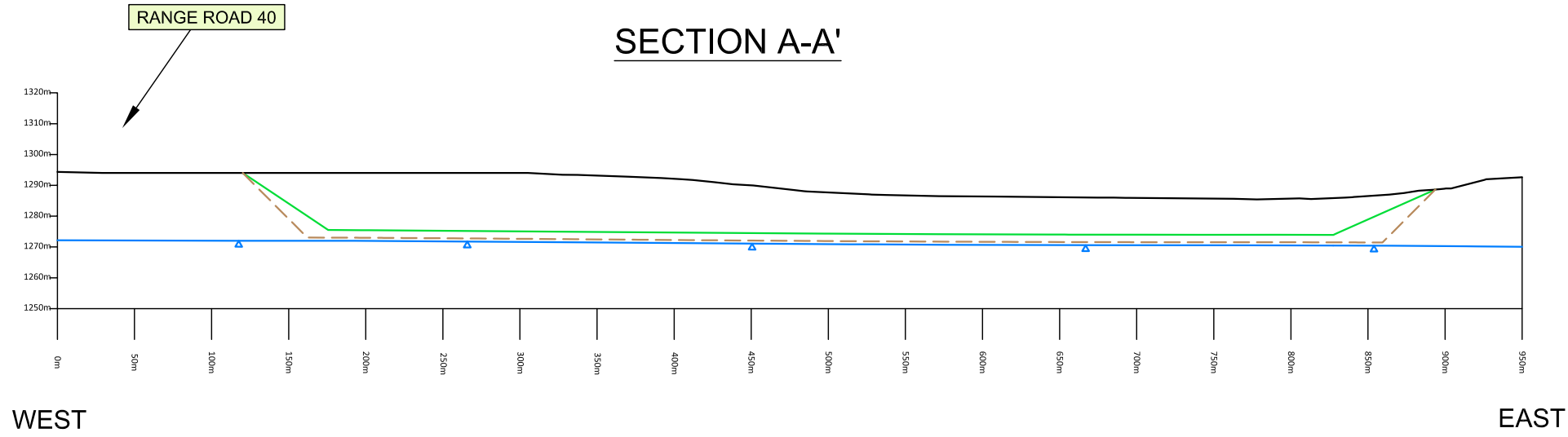
Scale 1:6,000 @ A3 Date APR 2021



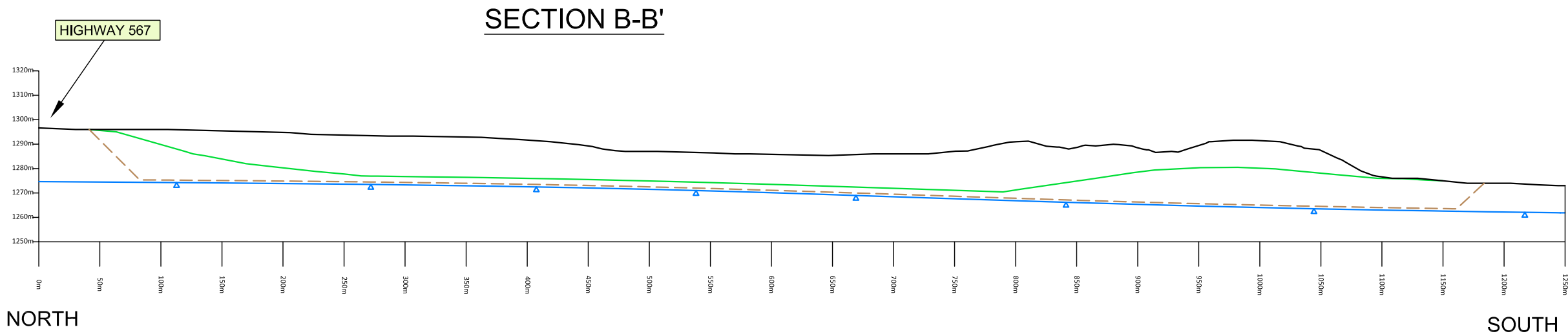
NOTES

LEGEND

-  RECLAMATION PROFILE
-  AVERAGE MAXIMUM GROUNDWATER LEVEL
-  PIT PROFILE
-  PRE-MINING TOPOGRAPHY



SCALE:  
 1:2,000 @A3  
 (VERTICAL)  
 1:4,000 @A3  
 (HORIZONTAL)  
 2x VERTICAL  
 EXAGGERATION



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STRIPPING & GRADING

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CROSS SECTIONS

03

Scale SEE INSET

Date APR 2021

