

# Rosie Nickel Sulphide Scoping Study A Platform for Growth

## Investor Update - August 2021

Nickel is a key component used in the manufacturing of lithium-ion batteries that power electric vehicles, a segment that is expected to play a critical role in global decarbonisation.

*“Demand for nickel in batteries is estimated to grow by over 500% over the next decade, largely to support the world's rising demand for electric vehicles” - BHP 22 July 2021*

*Stuart Fogarty Managing Director*

# Cautionary Statement

---

This presentation has been prepared by Duketon Mining Limited (“Duketon”). The information contained in this presentation is a professional opinion only and is given in good faith. Certain information in this document has been derived from third parties and though Duketon has no reason to believe that it is not accurate, reliable or complete, it has not been independently audited or verified by Duketon. Any forward-looking statements included in this document involve subjective judgement and analysis and are subject to uncertainties, risks and contingencies, many of which are outside the control of, and may be unknown to, Duketon. In particular they refer only to the date of this document, they assume the success of Duketon’s strategies, and they are subject to significant regulatory, business, competitive and economic risks and uncertainties. Actual future events may vary materially from those in the forward-looking statements. Recipients of this document are cautioned not to place undue reliance on such forward-looking statements. Duketon makes no representation or warranty as to the accuracy, reliability or completeness of information in this document and does not take responsibility for updating any information or correcting any error or omission which may become apparent after this document has been issued. To the extent permitted by law, Duketon and its officer’s employees, related corporations and agents disclaim all liability, whether direct, indirect or consequential for any loss or damage arising out of, or in connection with, any use or reliance on this presentation or information. All amounts are in A\$ unless otherwise stated.

## **Competent Person Statement:**

This announcement includes information extracted from the Company’s previous ASX announcements, which are available to view on the Company’s website ([www.duketonmining.com.au](http://www.duketonmining.com.au)), as follows:

- Rosie Mineral Resources – ASX announcement dated 4 March 2021;
- C2 Mineral Resources – ASX announcement dated 29 January 2015;
- Rosie metallurgical results – ASX announcements dated 8 July 2020 and 10 July 2020;
- Rosie Scoping Study production targets and forecast financial results derived from production targets – ASX announcement dated 28 April 2021.

The Company confirms that it is not aware of any new information or data that materially affects the information included in the original market announcements and, in the case of estimates of Mineral Resources or Ore Reserves, that all material assumptions and technical parameters underpinning the estimates in the relevant market announcements continue to apply and have not materially changed. The Company confirms that the form and context in which the Competent Person’s findings are presented have not been materially modified from the original market announcements.

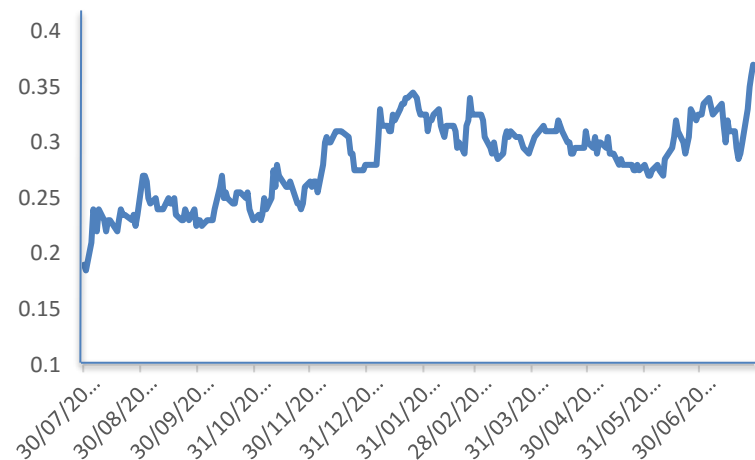
In the case of the Rosie Scoping Study, the Company confirms that it is not aware of any new information or data that materially affects the information included in the original market announcement and that all material assumptions underpinning the production target or the financial information derived from the production target in the relevant market announcement continue to apply and have not materially changed. The Company confirms that the form and context in which the Competent Person’s findings are presented have not been materially modified from the original market announcement.

# Corporate Overview

Duketon Mining Limited	ASX: DKM
Shares on Issue	121m
Options on Issue <sup>1</sup>	11.7m
<b>Market Cap. @ 38.0c</b>	<b>\$46m</b>
Cash + Investments	~\$31m
<b>Enterprise Value</b>	<b>\$15m</b>

1. Volume weighted exercise price of 24 cents

## Share Price Chart (Last 12 Months)



## Board & Management

<b>Seamus Cornelius</b>	<b>Non-Executive Chairman</b>	Mr Cornelius is an experienced international corporate lawyer and public company board member. He was based in Shanghai and Beijing from 1993 until 2017 and from 2000 to 2010 was a partner with a large international law firm. He specialized in dealing with cross border investment particularly in the energy and resource sector. He also advised international banks on their business in China and China SOE's on outbound investment. Since 2010 he has served as a public listed company Director and is currently a non-executive director of Duketon Mining Limited, Danakali Limited, E25 Limited and Buxton Resources Limited.
<b>Stuart Fogarty</b>	<b>Managing Director</b>	Mr Fogarty has over 25 years of exploration experience with BHP Billiton and Western Mining Corporation. He was BHP's Senior Exploration Manager for North and South America. Mr Fogarty has a very strong background in nickel exploration, having commenced his career at Kambalda Nickel in 1994. He has held senior roles with BHP including Senior Geoscientist for nickel exploration in the Leinster and Mt Keith region, Project Manager WA Nickel Brownfields and Regional Manager Australia – Asia where he was responsible for a \$100 million per annum exploration budget.
<b>Heath Hellewell</b>	<b>Non Executive Director</b>	Mr Hellewell is an exploration geologist with 25 years of experience, predominantly in Australia and West Africa. Heath joined Independence Group NL in 2000 prior to the Company's IPO and was part of the team that identified and acquired the Tropicana project area, eventually leading to the discovery of the Tropicana gold deposit. He was co-founding Executive Director of Doray Minerals Limited, where he was responsible for the Company's exploration and new business activities. Following the discovery of the Andy Well gold deposits, Doray Minerals was named "Gold Explorer of the Year" in 2011 by The Gold Mining Journal and in 2014 Heath was the co-winner of the prestigious "Prospector of the Year" award, presented by the Association of Mining and Exploration Companies. Heath played a key role in the acquisition of the 1.5Moz Karlawinda Gold Project in 2015 and was a founding director of Capricorn Metals, where he became Executive Chairman until 2018.

# Strategies to Drive Shareholder Value

---

## **1. Expand/Study Nickel Resources**

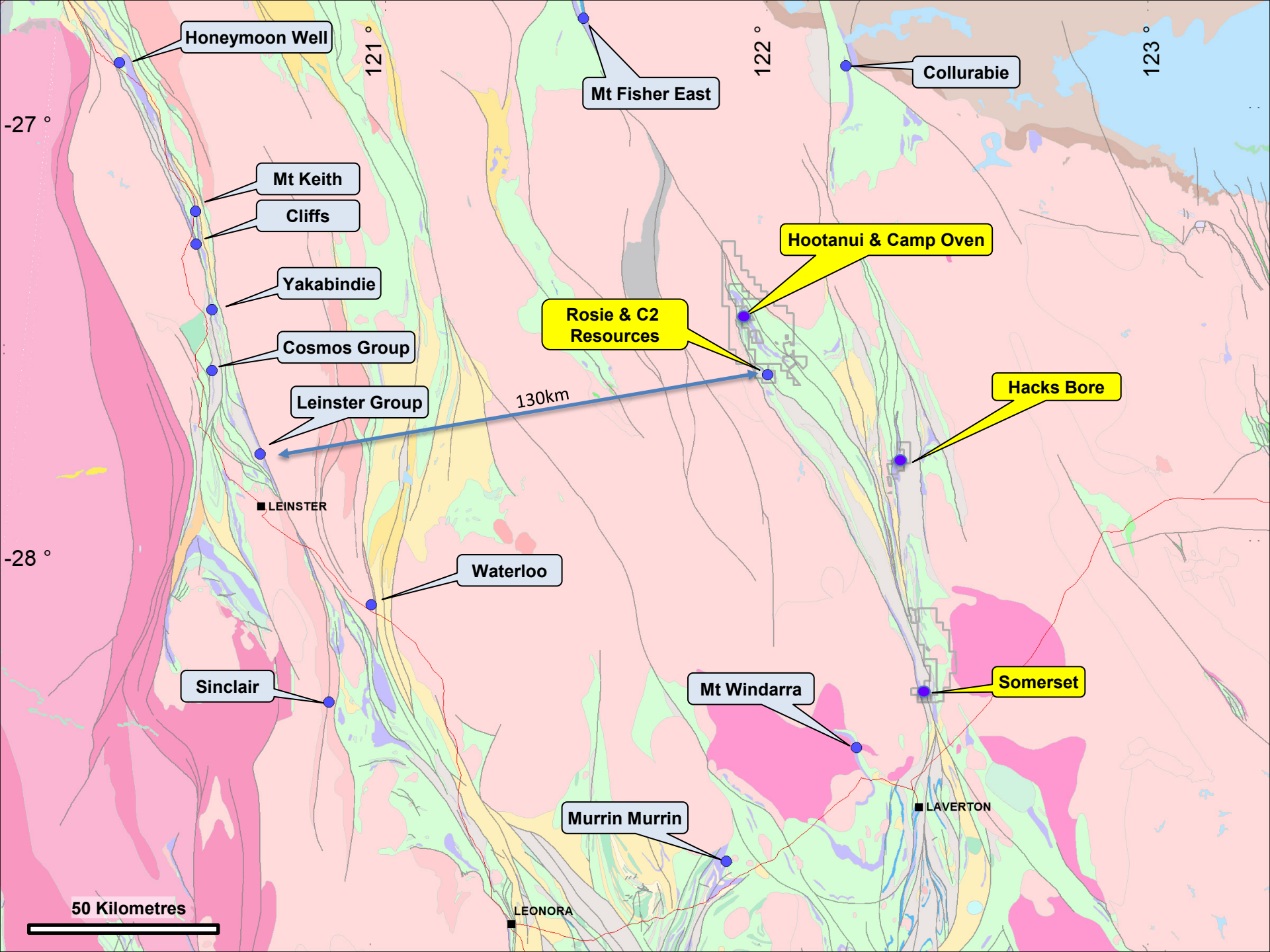
**Mining study, target extensions to Rosie, C2 and greater area for Ni-Cu-PGE**

## **2. New Projects**

**Acquire advanced Au or Ni project with inherent upside that can be unlocked through technical and/or commercial means**

## **3. New Tenure**

**Acquire new tenure via opportunistic applications or simple/low cost commercial means**

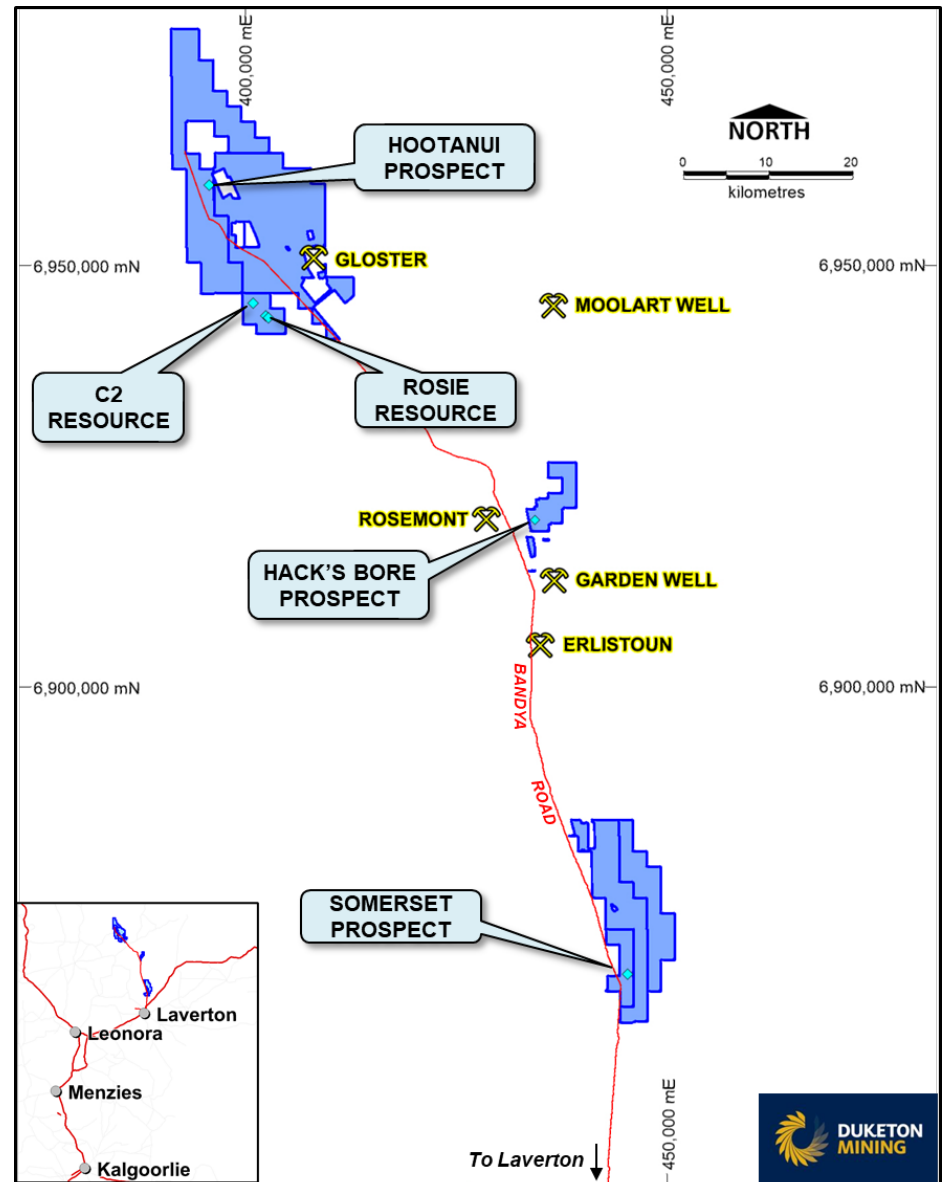


# Strategic Location

## Large land position - multiple projects

- 87,100t of nickel metal in JORC resources
- 12,900t of copper metal in JORC resources
- 230koz PGE's in JORC resources
- Positive metallurgical results, up to 97% recovery and 22% Ni concentrate achieved.\*
- Access to most prospective tenure for nickel discovery
- 26km strike length of prospective unit
- Minimal holding cost
- Surety of mining tenure

## *A pipeline of opportunities*



\* See ASX announcements 8 July 2020 and 10 July 2020

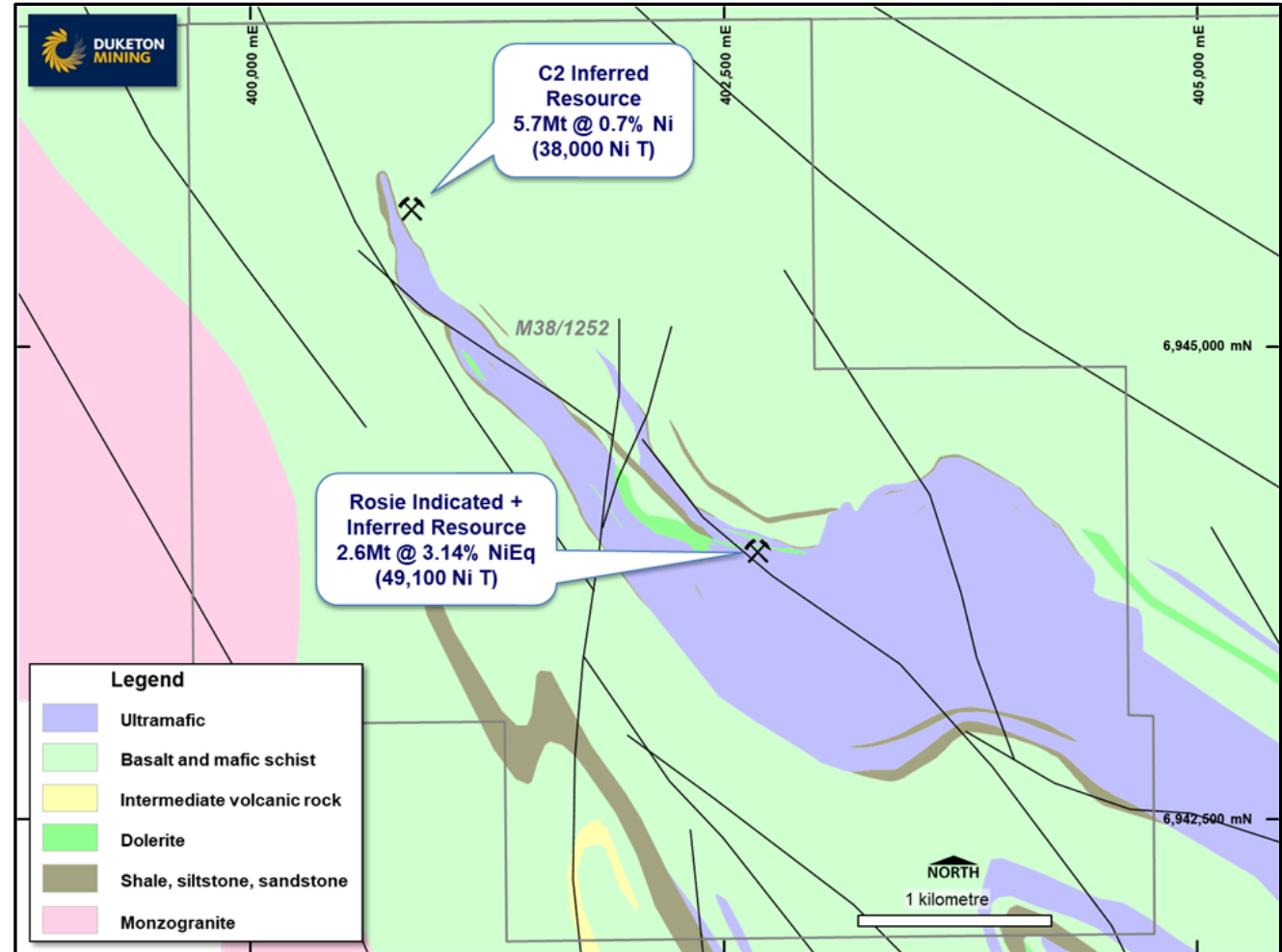
# +87k t of Ni metal, +230koz PGE's and growing

## Rosie Nickel Deposit

- Mineral Resource Estimate 2021
  - 49,100t nickel,
  - 10,600t copper,
  - 205,000oz PGE's

## C2 Nickel Deposit

- Mineral Resource Estimate 2015
  - 38,000t nickel,
  - 2,300t copper,
  - 26,000oz Pt + Pd



**Both deposits open at depth and along strike**



402000mE

402250mE

402500mE

402750mE

Surface

500m

Top of Fresh Rock

250m

0m

**Legend**

● &gt;10 Ni % m

● 8 – 10 Ni % m

● 6 – 8 Ni % m

● 4 – 6 Ni % m

● 2 – 4 Ni % m

● &lt;1 Ni % m

● No significant intercept

--- Inferred Resource 2020

— Indicated Resource 2020

**ROSIE  
LONG SECTION**

250m

6m @ 2.56% Ni

9m @ 1.45% Ni

5.2m @ 3.3% Ni

7.4m @ 1.41% Ni  
inc. 4.6m 1.95% Ni

8.1m @ 1.2% Ni

6.8m @ 1.5% Ni

9.22m @ 4.96% Ni

6.7m @ 1.2% Ni

3.73m @ 2.04% Ni

7.7m @ 1.4% Ni

3.7m @ 4.4% Ni

5.3m @ 2.6% Ni

4.6m @ 3.6% Ni

3.8m @ 2.3% Ni

5.2m @ 9.2% Ni



# +118k tonnes of NiEq in resource

## Significant combined NiEq. metal tonnes

Rosie Nickel Sulphide Resource >1% NiEq										
Classification	Tonnes	Ni (%)	Cu (%)	Co (ppm)	Total PGEs (g/t)	NiEq (%)	Ni (t)	Cu (t)	Co (t)	Total PGEs (oz)
Indicated	1,706,706	2	0.39	560	2.5	3.21	34,309	6,666	951	138,056
Inferred	850,234	1.7	0.47	560	2.5	3.01	14,806	3,958	473	67,268
<b>Total</b>	<b>2,556,940</b>	<b>1.9</b>	<b>0.42</b>	<b>560</b>	<b>2.5</b>	<b>3.14</b>	<b>49,115</b>	<b>10,624</b>	<b>1,423</b>	<b>205,324</b>

C2 Nickel Sulphide Resource >0.5%Ni (All Inferred)										
Classification	Tonnes	Ni (%)	Cu (%)	Co (ppm)	Total PGE's (g/t)	NiEq (%)	Ni (t)	Cu (t)	Co (t)	Total PGEs (oz)
<b>Total</b>	<b>5,700,000</b>	<b>0.7</b>	<b>0.04</b>	<b>N/A</b>	<b>0.14</b>	<b>N/A</b>	<b>38,000</b>	<b>2,280</b>	<b>N/A</b>	<b>25,660</b>

Total Duketon Mining Nickel Sulphide Resource (Indicated and Inferred)										
Classification	Tonnes						Ni (t)	Cu (t)	Co (t)	Total PGEs (oz)
<b>Total</b>	<b>8,256,940</b>						<b>87,115</b>	<b>12,904</b>	<b>1,423</b>	<b>230,984</b>

Rosie ~ 80k NiEq tonnes, C2 ~ 38k Ni tonnes

**Total ~ 118k NiEq tonnes**

***Only 3 out of 7 precious metals considered...***

# Positive Scoping Study - Solid Platform for Future Growth\*

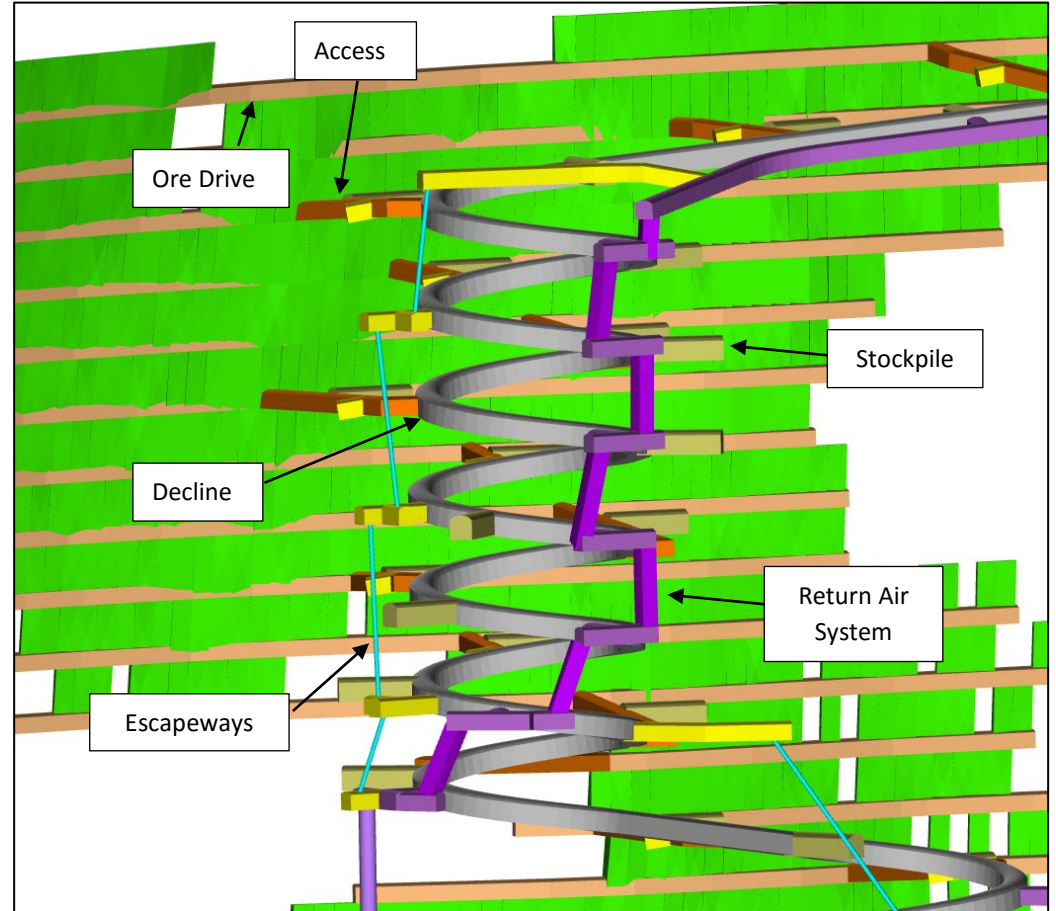
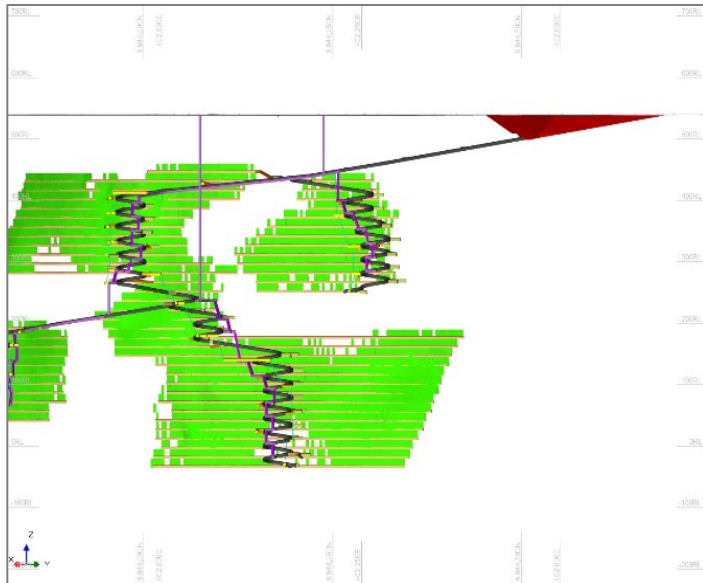
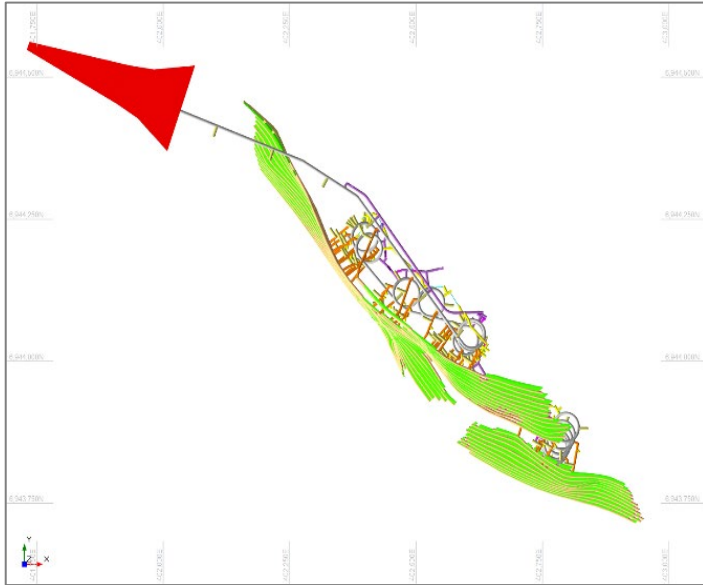
---

**Confirms the viability of a mining, trucking and toll treating operation assuming an 8-year mine life.**

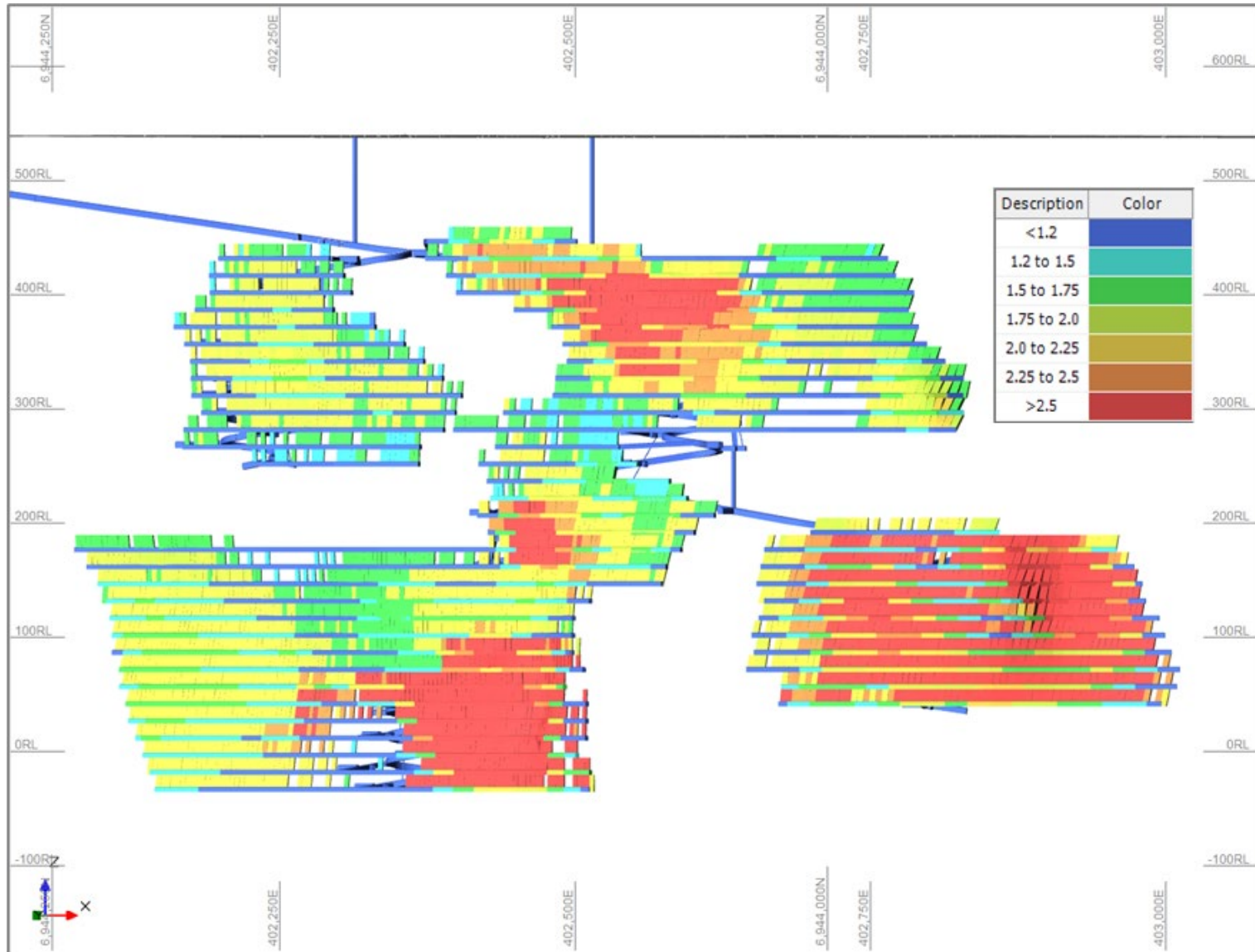
- Ni price of US\$8/lb (range US\$7.50/lb to US\$8.50/lb)
- NPV5 of ~ \$161M (range \$56m to \$204M)
- IRR of ~ 54% (range 21% to 66%)
- Pre-tax cashflow of ~ \$223M (range \$91M to \$278M)
- Pre-production capital cost of ~ \$18M
- Simple decline and underground mine – minimal surface infrastructure
- Annual production of approximately 315kt of ore at 2.1% NiEq

***Upside - Rosie PGE pit, C2 and concentrator on site***

# Simple Mining Plan



# Stope Grade Map



# Positive Metallurgical Work - Rosie\*

## High Quality Concentrate

- Ni recovery up to **97%**
- Intermediate con. up to **22% Ni**
- Nickel con. grading **16% Ni and 7g/t** total PGE's from massive ore
- Bulk con. grading **15%(Ni+Cu)** and **12g/t total PGE's** from violarite ore
- **Fe:MgO** from **8 to 64**
- PGE's recoverable by gravity **>8g/t** total PGE's – provides an alternate process option

## Latent value unlocked



(NB : >13% Ni or >12% Ni+Cu are considered saleable concentrates)

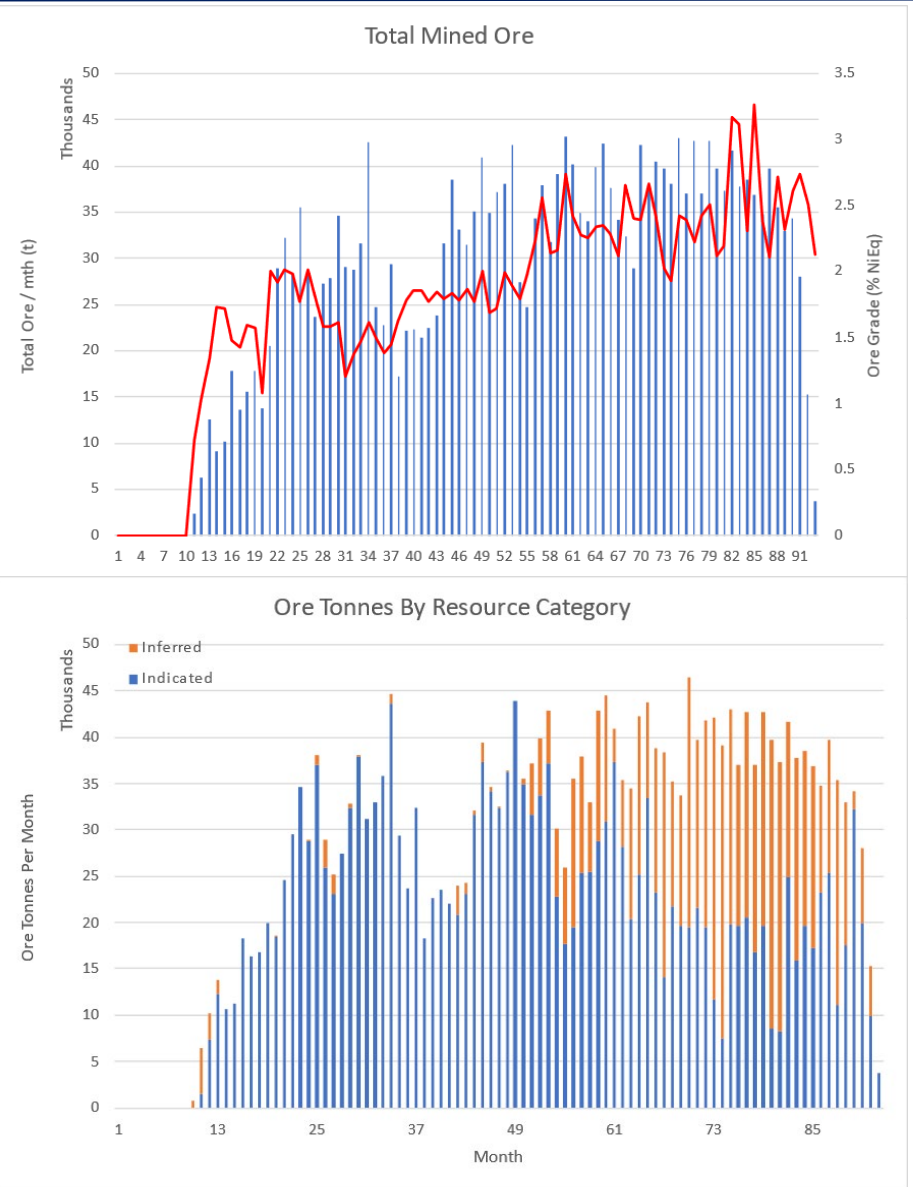


# Ore Production by Month

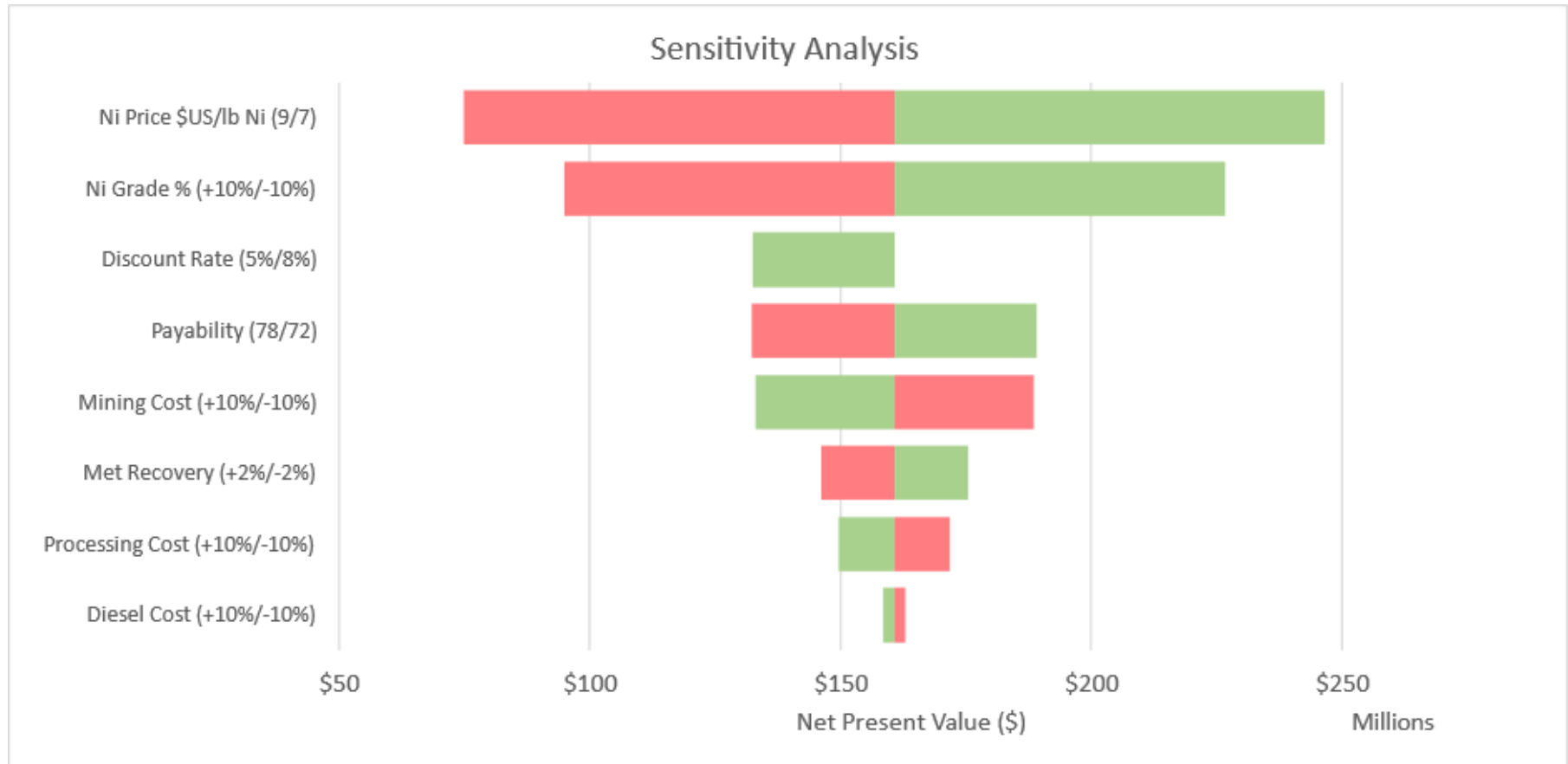
## Resource Confidence

- 73% of ore from Indicated
- 27% or ore from Inferred
- Production Rate ~ 30kt to 40kt per month

***High Confidence Early***

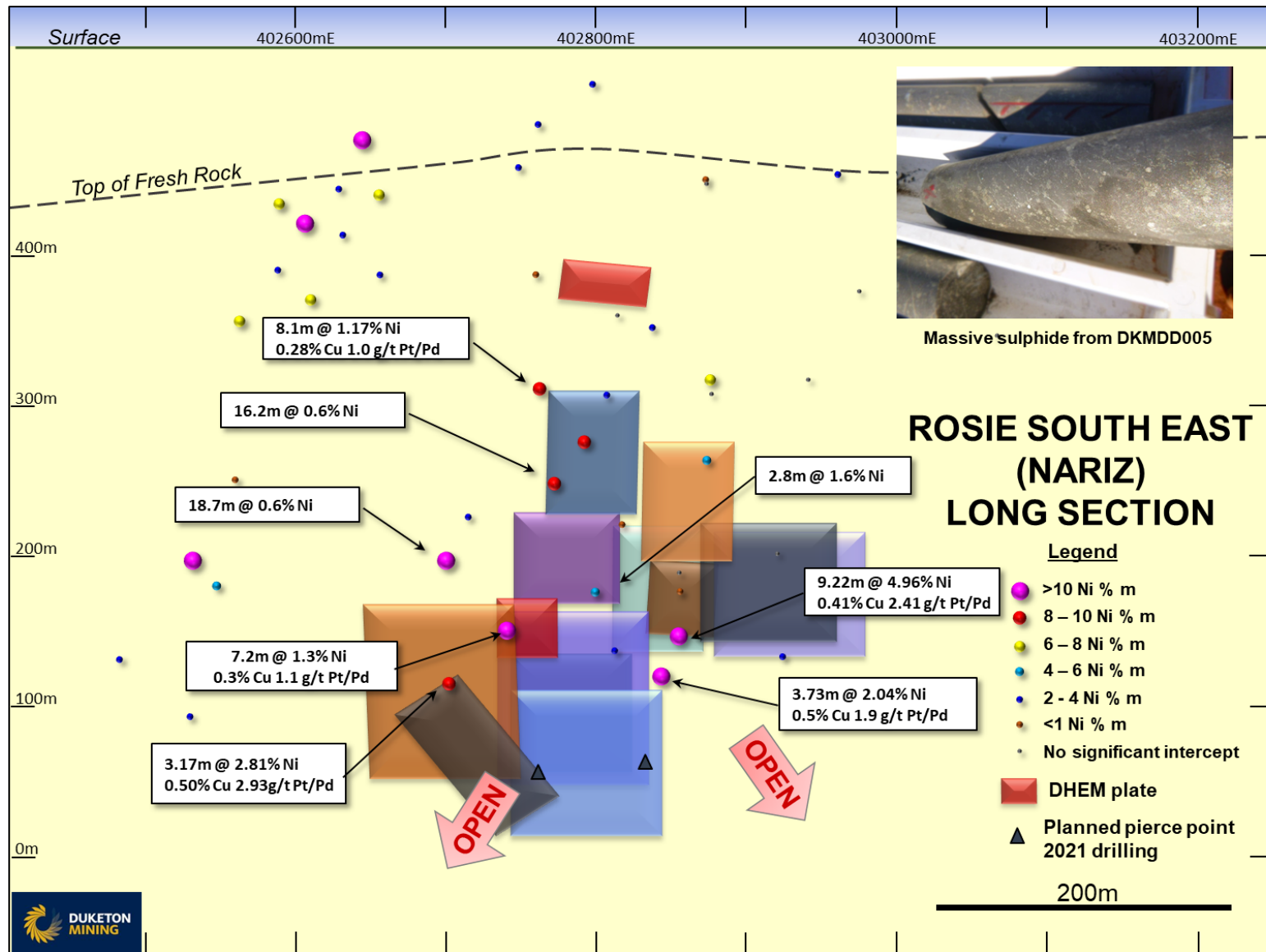


# Sensitivities – Impact on NPV

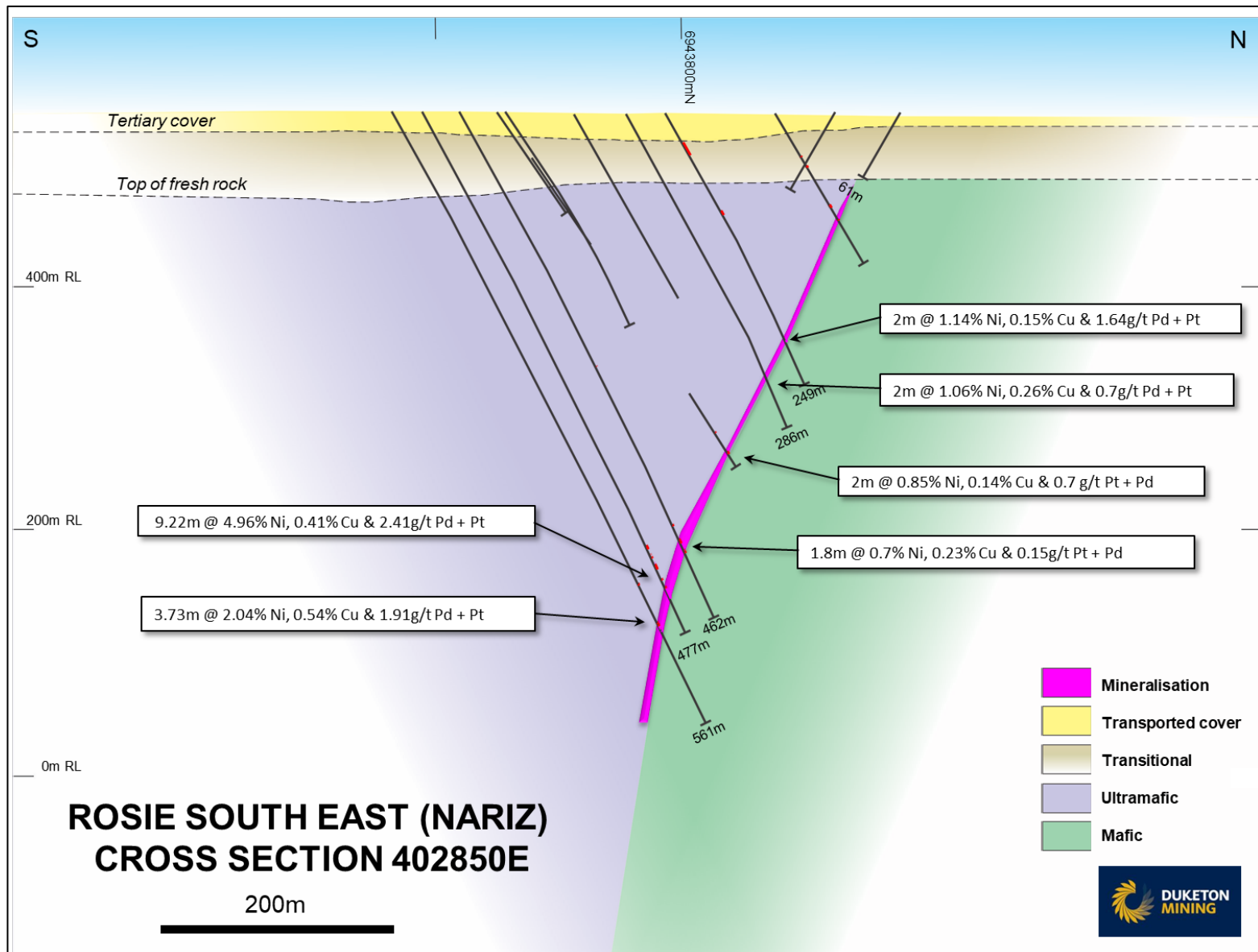




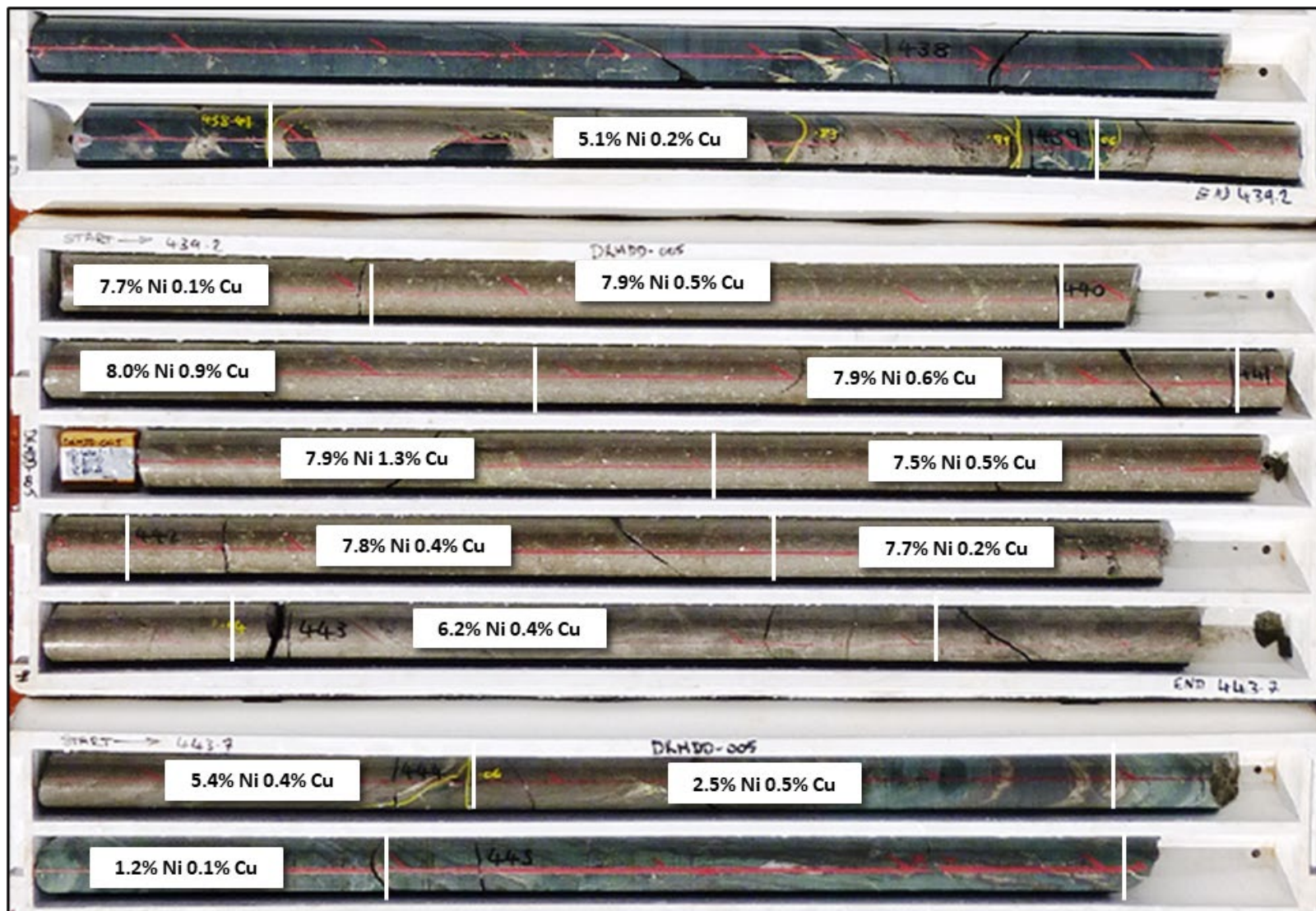
# Exploration Upside - Rosie South East



# Exploration Upside - Rosie South East



# 9.22M @ 4.96% Ni, 0.41% Cu and 2.41g/t Pt+Pd \*



\* Includes 5.65m @ 7.1%Ni, 0.5%Cu & 3.8g/t Pt+Pd

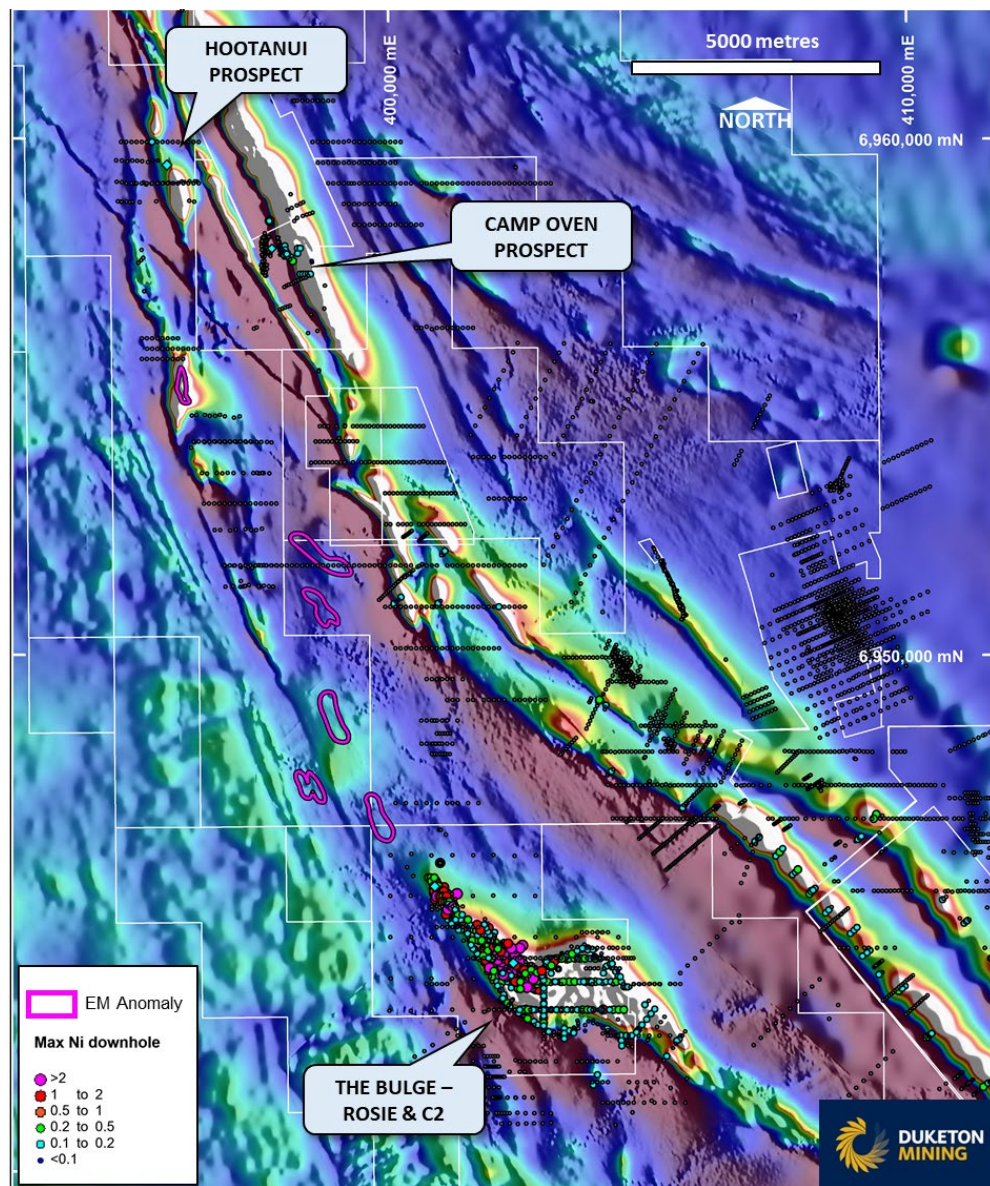


# Exploration Upside - Duketon North

## Multiple EM Responses and Ni Sulphides

- Eastern Ultramafic of Duketon North highly prospective for Ni sulphides
- Extensive surface geochemistry, U/M contacts outlined by +250ppm Cu and +2000ppm Ni.
- Historic drilling has intersected sulphides within serpentinised peridotites
- Ultramafic contacts not specifically targeted
- Large portions of the ultramafic remain untested by drilling

***Significant exploration potential***



# Investment Highlights

---

## Rosie Scoping Study

- ❑ Study has confirmed a viable trucking and toll treatment option over an 8yr mine life with upside in the following;
  - use all precious metals in NiEq calculation + closer to spot prices
  - Rosie oxide pit, standalone concentrator, C2 pit as additional feed
  - Exploration upside – extensions and new positions – drilling commencing

## Corporate

- ❑ Cash (+ liquids) balance of ~\$31million – **WELL FUNDED**
- ❑ EV of \$10M (Market Cap. \$41M) – **LEVERAGED TO DISCOVERY & DEVELOPMENT**

# Contact Details

---



**Duketon Mining Ltd.**

Phone +61 473798006

Web: [www.duketonmining.com.au](http://www.duketonmining.com.au)

**Head Office**

2<sup>nd</sup> Floor, 25 Richardson  
Street, West Perth  
Western Australia 6005