

21 December 2022

Possible New Mineralised Zone Identified Following Multiple 30m+ Intercepts at Mavis Lake

Highlights

- Drilling completed over the last two weeks has intercepted a potential new area of mineralisation staked under the Mavis Lake Main Zone
- Multiple thick intercepts of spodumene-bearing pegmatite observed down-dip of the Main Zone.
- A possible pegmatite stack at depth has also been identified via intercepts from multiple drill holes
- All intercepts are to be included in the JORC 2012 Maiden Mineral Resource Estimate, which is currently being prepared
- Significant intercepts include:
 - Drill Hole MF22-180 over 35m of spodumene-bearing pegmatite from 197m downhole
 - Drill Hole MF22-179 over 23m of spodumene-bearing pegmatite from 157m downhole
 - Drill Hole MF22-177 over 30m of spodumene-bearing pegmatite from 175m downhole
- Over 19,739 drill meters completed in 2022 with assays pending for core from 29 drill holes

Overview

Critical Resources Limited (ASX:CRR) ("Critical Resources" or "the Company") is pleased to advise of multiple, thick intercepts of spodumene-bearing pegmatite from the current drill program at Mavis Lake.

The intercepts identify a potential new significant zone, stacked under the Main Zone. This stacked zone may link to previous intercepts at depth extending over a 500m strike. At the recommencement of drilling in January, efforts will be focused on continued extension of the Main Zone while testing the continuity of the potential stacked zone. A cross section highlighting the potential new zone can be seen in figure 1.

Full details and exploration results confirmed by visual assessment can be seen in Appendix 1.1

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¹In relation to the disclosure of visual mineralisation, the Company cautions that visual estimates of mineral abundance should never be considered a proxy or substitute for laboratory analysis. The reported intersections are down hole measurements and are not necessarily true width. Descriptions of the mineral amounts seen and logged in the core are qualitative, visual estimates only. Refer Cautionary Note – Visual Estimates



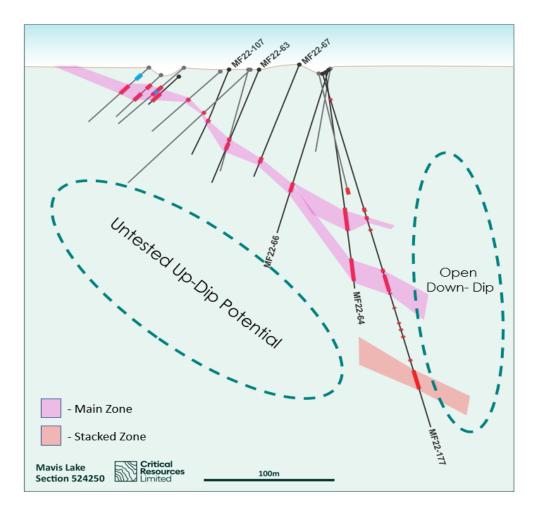


Figure 1 – Vertical cross section of 524250E looking west with stacked pegmatite projection



Figure 2 - MF22-177 drill core showing spodumene laths from 258.55 to 274.8m down hole, a potential new zone of spodumene mineralisation, stacked under the Mavis Lake Main Zone

Critical Resources' Managing Director Alex Cheeseman said:

"This is an extremely satisfying way to finish what has been a very productive year at Mavis Lake. Less than a fortnight after announcing a major extension to the Main Zone's strike length, we're pleased to announce multiple, significant intercepts with a stand out of 35 meters of spodumene-bearing pegmatite from drill hole MF22-180.

Furthermore, the potential of a new zone is incredibly exciting and as such we are planning to drill test the continuity of this stacked zone as a priority in the new year.

Given the abundance of quality drilling targets, additional tenements under acquisition and the strengthening of our financial position following the recent execution of a flow-through funding arrangement, we are in a very strong position to capitalize on our hard work in 2022 with a strong start to 2023.

We are also looking forward to testing the potential of this new system, releasing further assay results and to working on the additional tenements under acquisition, all which will be positive for the Mavis Lake project as a whole."

Future Works

The Mavis Lake Lithium Project continues to illustrate its growing potential through both continued down dip extension and the identification of a possible stacked zone.

The stacked zone has not been tested and could be a parallel structure of the main zone, that remains open along strike and depth, as shown in figure 1.

Testing the stacked zone for continuity and extending the known main zone will be priority effort when drilling recommences in early January 2023.

This announcement has been approved for release by the Board of Directors -ends-

For further information please contact

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COMPETENT PERSONS STATEMENT

The information in this ASX Announcement that relates to Exploration Results is based on information compiled by Mr. Troy Gallik (P. Geo), a Competent Person who is a Member of the Association of Professional Geoscientists of Ontario. Troy Gallik is a full-time employee of Critical Resources. Mr. Gallik has sufficient experience that is relevant to the style of mineralisation and type of deposit under consideration and to the activity being undertaken to qualify as a Competent Person as defined in the 2012 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves". Mr. Gallik consents to the inclusion in this Announcement of the matters based on his information in the form and context in which it appears.

ABOUT CRITICAL RESOURCES LIMITED

Critical Resources is advancing and developing critical metals projects for a decarbonised future.

The Company's primary objective is the rapid development of its flagship Mavis Lake Lithium Project, located in Ontario, Canada. Mavis Lake is an advanced exploration project with near-term development potential. Importantly, Critical has an exciting opportunity for further regional growth through exploration at its Graphic Lake, Plaid and Whiteloon prospects, along with expanding its Canadian portfolio through potential increased land holdings and merger and acquisitions.

The Company's other projects include the Halls Peak Project in NSW, Australia, a high-quality base metals project with significant scale potential and the Block 4 and Block 5 copper project, located in Oman.

CAUTIONARY NOTE - VISUAL ESTIMATES

The Company stresses that the reported visual estimated percentages in Table I relate specifically to the abundance of spodumene logged in the drill core and is not estimated lithium grade for the interval.

In relation to the disclosure of visual mineralisation, the Company cautions that visual estimates of mineral abundance should never be considered a proxy or substitute for laboratory analysis. Laboratory assay results are required to determine the widths and grade of the visible mineralisation reported in preliminary geological logging.

The Company will update the market when laboratory analytical results become available. The reported intersections are down hole measurements and are not necessarily true width. Descriptions of the mineral amounts seen and logged in the core are qualitative, visual estimates (they are listed in order of abundance of estimated combined percentages). Quantitative assays will be completed by Activation Labs in Dryden, Ontario.

FORWARD LOOKING STATEMENTS

This announcement may contain certain forward-looking statements and projections. Such forward looking statements/projections are estimates for discussion purposes only and should not be relied upon. Forward looking statements/projections are inherently uncertain and may therefore differ materially from results ultimately achieved. Critical Resources Limited does not make any representations and provides no warranties concerning the accuracy of the projections and disclaims any obligation to update or revise any forward-looking statements/projects based on new information, future events or otherwise except to the extent required by applicable laws. While the information contained in this report has been prepared in good faith, neither Critical Resources Limited or any of its directors, officers, agents, employees or advisors give any representation or warranty, express or implied, as to the fairness, accuracy, completeness or correctness of the information, opinions and conclusions contained in this announcement.



Appendix 1 - Exploration Results

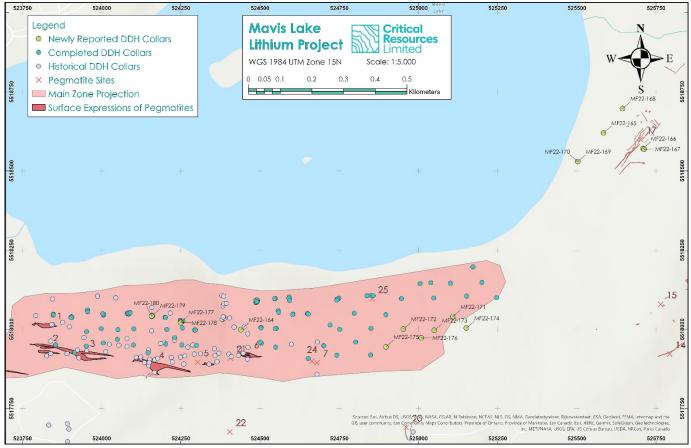


Figure 3 - Plan map recent DDH collar locations

Table 1 – Significant Intercepts of spodumene-bearing pegmatite confirmed through visual
estimate from drill holes MF22-164 to MF22-180

				Visual Estimate of					
Hole ID	From	То	Length	Spodumene					
MF22-180	197	226.5	29.5	5%					
and	228.8	233.85	5.05	5%					
and	295.25	298	2.75	5%					
and	318.5	319.7	1.2	Trace					
and	340.75	341.6	0.85	Trace					
MF22-179	157.25	161.8	4.55	<5%					
and	186.4	197.4	11	10%					
and	260.5	268.75	8.25	20%					
MF22-178	101.05	105.55	4.5	5%					
and	166.7	184.5	17.8	10%					
and	273.7	277.25	3.55	10%					
MF22-177	175.2	189.95	14.75	10%					
and	258.55	274.8	16.25	10%					
MF22-172	37	41.36	4.36	5%					

MF22-166	13.15	14.55	1.4	5%
MF22-164	79.65	83.9	4.25	15%
and	85.45	89	3.55	10%
and	123.55	124.6	1.05	5%



Figure 4 - MF22-180 drill core photo, over 30m of spodumene from 197m down hole

Hole ID	Date I	Date Drilled		UTM Zone 15N (NAD83)		Col Orient	llar tation	Metres [Drilled
Hole ID	Start Date	End Date	Easting	Northing	Elevation	Az	Dip	Casing Depth	End Depth
MF22-164	07-Nov-22	10-Nov-22	524439	5517999	411	255	-45	3	302
MF22-165	15-Nov-22	16-Nov-22	525584	5518620	422	110	-45	9	230
MF22-166	17-Nov-22	18-Nov-22	525709	5518571	429	340	-45	3	113
MF22-167	19-Nov-22	20-Nov-22	525712	5518569	429	250	-45	3	161
MF22-168	21-Nov-22	23-Nov-22	525644	5518697	423	110	-45	3	197
MF22-169	24-Nov-22	24-Nov-22	525503	5518530	421	110	-45	12	29
MF22-170	24-Nov-22	25-Nov-22	525503	5518530	421	110	-45	15	146
MF22-171	26-Nov-22	27-Nov-22	525108	5518040	423	170	-70	15	161
MF22-172	27-Nov-22	27-Nov-22	524952	5518001	424	170	-60	9	134
MF22-173	28-Nov-22	29-Nov-22	525050	5517997	425	170	-60	12	122
MF22-174	29-Nov-22	30-Nov-22	525151	5518004	425	170	-60	6	134
MF22-175	30-Nov-22	01-Dec-22	524897	5517945	425	170	-45	3.6	149
MF22-176	01-Dec-22	02-Dec-22	525009	5517973	431	150	-45	6	200
MF22-177	04-Dec-22	07-Dec-22	524250	5518023	444	0	-75	3	308
MF22-178	07-Dec-22	09-Dec-22	524249	5518021	442	55	-70	3	323
MF22-179	10-Dec-22	11-Dec-22	524160	5518044	454	20	-75	3	302
MF22-180	12-Dec-22	14-Dec-22	524158	5518042	453	320	-70	3	350

Table 2 - Drill Hole Summary MF22-164 to MF22-180

JORC Table 1 - MF22-164 to MF22-180 Exploration Results

Section 1: Sampling Techniques and Data

(Criteria in this section apply to all succeeding sections)

Criteria	JORC-Code Explanation	Commentary
Sampling techniques	Nature and quality of sampling (e.g., cut channels, random chips, or specific specialised industry standard measurement tools appropriate to the minerals under investigation, such as down hole gamma sondes, or handheld XRF instruments, etc). These examples should not be taken as limiting the broad meaning of sampling.	 Oriented NQ core was cut in half using a diamond saw, with a half core sent for assay and half core retained. No other measurement tools other than directional survey tools have been used in the holes at this stage.
	Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.	 sampling is conducted based on core logging, 100% of arill hole core is logged. The core logger is a geologist, has experience in
	mineralisation that are Material to the Public Report. In cases where 'industry standard' work has been done this would be relatively simple (e.g., 'reverse circulation drilling was used to obtain 1 m samples from which 3 kg was pulverised to produce a 30 g charge for fire assay'). In other	lithium mineralisation, and determines the intervals of samples. All pegmatite intersections are sampled regardless of the visual presence of lithium minerals/spodumene. Host rock is typically not sampled as lithium mineralisation is localized to pegmatites (spodumene mineral) or their alteration halos (holmquistite mineral) within mafic volcanic host rock. • Determination of mineralisation has been based on geological logging and photo analysis. • Diamond Core drilling was used to obtain 3m length samples from the barrel which are then marked in one
	required, such as where there is coarse gold that has inherent sampling problems. Unusual commodities or mineralisation types (e.g., submarine nodules) may warrant disclosure of detailed information.	metre intervals based on the drillers core block measurement. • Assay samples are selected based on geological logging boundaries or on the nominal metre marks. • Samples will be dispatched to an accredited laboratory (ActLabs) in Dryden, Ontario, Canada for sample preparation and shipment to analysis.



Criteria	JORC-Code Explanation	Commentary
Drilling techniques	Drill type (e.g., core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (e.g., core	• NQ2 diamond double tube coring by Cyr EF-50 rig was used throughout the hole.
	diameter, triple or standard tube, depth of diamond tails, face- sampling bit or other type, whether	• Core orientation was carried out by the drilling contractor.
Drill sample recovery	Method of recording and assessing core and chip sample	• Lithological logging, photography
	recoveries and results assessed.	 Core samples were measured with a standard tape within the core trays. Length of core was then compared to the interval drilled, and any core loss was attributed to individual rock units based on the amount of fracturing, abrasion of core contacts, and the conservative judgment of the core logger. Results of core
	Measures taken to maximise sample recovery and ensure representative nature of the samples.	loss are discussed below. • Experienced driller contracted to carry out drilling.
		•In broken ground the driller produced NQ core from short runs to maximise core recovery.
	Whether a relationship exists between sample recovery and grade and whether sample bias	• Core was washed before placing in the core trays.
	may have occurred due to preferential loss/gain of fine/coarse material.	 Core was visually assessed by professional geologists before cutting to ensure representative sampling.
		• See "Aspects of the determination of mineralisation that are Material to the Public Report" above.
Logging	Whether core and chip samples have been geologically and geotechnically logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies.	
	Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.	



The total length and percentage	 Core samples were not geotechnically logged.
of the relevant intersections logged.	 Core samples have been geologically logged to support appropriate Mineral Resource estimation, mining studies and
	metallurgical studies.
	 The core logging was qualitative in nature.
	• All core was photographed
	•Total length of the MF22-164 was 302
	• 100% of the relevant intersections were logged.
	Total length of the MF22-165 was 230m
	 100% of the relevant intersections were logged.
	Total length of the MF22-166 was 113
	• 100% of the relevant intersections were logged.
	Total length of the MF22-167 was 161m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-168 was 197
	• 100% of the relevant intersections were logged.
	Total length of the MF22-169 was 29m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-170 was 146m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-171 was 161m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-172 was 134m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-173 was 122m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-174 was 134m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-175 was 149m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-176 was 200m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-177 was 308m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-178 was 323m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-179 was 302m
	• 100% of the relevant intersections were logged.
	Total length of the MF22-180 was 350m
	• 100% of the relevant intersections were logged.



Criteria	JORC-Code Explanation	Commentary
Sub-sampling techniques and sample preparation	takan	•Oriented core was placed V-rail and a consistent cut-line drawn along core to ensure cutting (halving) of representative samples •Oriented NQ core was cut in half using a diamond saw, with half
	For all sample types, the nature, quality and appropriateness of the sample preparation technique.	core sent for assay and half core retained. •Core sample intervals were based in logged mineralisation •No duplicates or second half-sampling • Appropriate method: oriented NQ core cut in half using a diamond saw, with a half core sent for assay and half core
	Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.	retained
	Measures taken to ensure that the sampling is representative of the in situ material collected, including for instance results for field duplicate/second-half sampling.	
	Whether sample sizes are appropriate to the grain size of the material being sampled.	
Quality of assay data and laboratory tests	The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.	 Assays methods appropriate for style of mineralisation: UT-7 (Li up to 5%) QOP Sodium Peroxide (Sodium Peroxide Fusion ICPOES + ICPMS. Samples have been sent to an accredited laboratory - Activation Laboratories Ltd. (ActLabs).
	For geophysical tools, spectrometers, handheld XRF instruments, etc, the parameters used in determining the analysis including instrument make and model, reading times, calibrations factors applied and their derivation, etc.	 Either standards or blanks are inserted every 10th sample interval as a part of a QAQC process. Standard and blank results from recent drilling are within acceptable margins of error. Activation Laboratory performs internal QA/QC measures. Results are released once all internal QA/QC is verified and confirmed to be acceptable.
	Nature of quality control procedures adopted (e.g., standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (i.e., lack of bias) and precision have been established.	



Criteria	JORC-Code Explanation	Commentary					
Verification of sampling and assaying	The verification of significant intersections by either independent or alternative company personnel. The use of twinned holes.	 No independent verification completed at this stage. No holes are twins of previous holes. 					
	Documentation of primary data,	• Core measured, photographed and logged by geologists. Digitally recorded plus back-up records.					
	Discuss any adjustment to assay data.	 All assay results are provided. No adjustments to the assay data. No assay cut off grades are applied. 					
Location of data points							
	Specification of the grid system used. Quality and adequacy of topographic control.	 WGS 1984 UTM Zone 15N. No specific topography survey has been completed over the project area. 					
Data spacing and distribution	Data spacing for reporting of Exploration Results.	• Not relevant to current drilling.					
	Whether the data spacing, and distribution is sufficient to establish the degree of geological and grade continuity appropriate for the Mineral Resource and Ore Reserve estimation procedure(s) and classifications applied. Whether sample compositing has been applied.	 Not relevant to current drilling. Core sample intervals were based in logged mineralisation and no sample composting applied. Reporting of final results includes many weighted average- composting of assay data. 					
Orientation of data in relation to geological structure		 The orientation of the mineralisation is unknown. The drilling program is aimed at determining orientation of the mineralisation. If orientation of mineralisation is known or thought to be known, drill holes are planned to intersect at an appropriate angle 					



Criteria	JORC-Code Explanation	Commentary
	orientation of key mineralised structures is considered to have	relative to true width of the mineralisation. Intercepts with mineralisation released are given as downhole widths, not true widths unless true widths are stated • It is uncertain whether sampling bias has been introduced, or whether the thickness drilled is a true thickness.
Sample security	The measures taken to ensure sample security.	• Core samples were stored at the Dryden core yard and core shack under lock and key before delivery to ActLabs in Dryden, Ontario for analysis.
Audits or reviews	The results of any audits or reviews of sampling techniques and data.	• Not undertaken at this stage.

Section 2: Reporting of Exploration Results

(Criteria listed in the preceding section also apply to this section)

Criteria	JORC-Code Explanation	Commentary
land tenure status	Type, reference name/number, location and ownership including agreements or material issues with third parties such as joint ventures, partnerships, overriding royalties, native title interests, historical sites, wilderness or national park and environmental settings.	The Mavis Lake Lithium Project consists of 189 unpatented Single Cell Mining Claims and six separate surface leases which secure the surface rights of the land required for the Project footprint. All claims and leases are active and in good standing. The leases have a term of 21 years and are not set to expire until 2032, at which time they can be renewed for an additional 21 years if required.
	The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area.	
•		• Previous exploration has been conducted by a number of parties including Lun-Echo Gold Mines Limited (1956), Selco Mining Corporation (1979-1980), Tantalum Mining Corporation of Canada Limited (1981-1982), Emerald Field Resources (2002), International Lithium Corp (2006-2021) and Pioneer Resources Limited/Essential Metals Limited (2018-2021).
Geology		• The Fairservice and Mavis Lake Prospects host zoned pegmatites that are prospective for lithium and tantalum

Criteria	JORC-Code Explanation	Commente	ary										
Drill hole	A summary of all information	Hole ID	Easting	Northing	Elevation	Az	Dip	End Depth					
Information	material to the understanding of the exploration results including a	MF22-164	524439	5517999	411	255	-45	302					
	tabulation of the following	MF22-165	525584	5518620	422	110	-45	230					
	information for all Material drill	MF22-166	525709	5518571	429	340	-45	113					
	holes:	MF22-167	525712	5518569	429	250	-45	161					
	Easting and northing of the drill	MF22-168	525644	5518697	423	110	-45	197					
	hole collar	MF22-169	525503	5518530	421	110	-45	29					
	Elevation or RL (Reduced Level – elevation above sea level in	MF22-170	525503	5518530	421	110	-45	146					
	metres) of the drill hole collar	MF22-171	525108	5518040	423	170	-70	161					
	Dip and azimuth of the hole	MF22-172	524952	5518001	424	170	-60	134					
	down hole length and interception	MF22-173	525050	5517997	425	170	-60	122					
	depth	MF22-174	525151	5518004	425	170	-60	134					
	hole length.	MF22-175	524897	5517945	425	170	-45	149					
	If the exclusion of this information is justified on the basis that the information is not Material and this exclusion does not detract from the understanding of the report, the Competent Person should clearly explain why this is the case.	MF22-176	525009	5517973	431	150	-45	200					
		MF22-177	524250	5518023	444	0	-75	308					
		MF22-178	524249	5518021	442	55	-70	323					
		MF22-179	524160	5518044	454	20	-75	302					
		MF22-180	524158	5518042	453	320	-70	350					
		 All drill collars are re-surveyed at a later date upon completion of drill hole for accurate collar coordinates. 											
Data aggregation methods	In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (e.g., cutting of high grades) and cut-off grades are usually Material and should be stated.	• Uncut.											
	Where aggregate intercepts incorporate short lengths of high- grade results and longer lengths of low grade results, the procedure used for such aggregation should be stated and some typical examples of such aggregations should be shown in detail.	• All aggregi averages. • None used		epts deta	iled on ta	bles are	weight	ed					
	The assumptions used for any reporting of metal equivalent values should be clearly stated.												



Criteria	JORC-Code Explanation	Commentary
mineralisation widths and intercept lengths	important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the	 True width is calculated from logging geologists structural measurements from upper and lower contacts of pegmatite dyke and the host rock. Both apparent downhole lengths and true widths are provided. The precise geometry is not currently known but is being tested
	If it is not known and only the down hole lengths are reported, there	 The places geometry is not callently known but is being tested by the planned drilling, with diamond drill hole azimuths designed to drill normal to the interpreted mineralised structure. Down-hole length reported, true width not known.
		• The drilling is aimed at clarifying the structure of the mineralisation.
reporting	Where comprehensive reporting of all Exploration Results is not practicable, representative reporting of both low and high grades and/or widths should be practiced to avoid misleading reporting of Exploration Results.	• Representative reporting of all relevant grades is provided in tables to avoid misleading reporting of Exploration Results.
exploration data	Other exploration data, if meaningful and material, should be reported including (but not limited to): geological observations; geophysical survey results; geochemical survey results; bulk samples – size and method of treatment; metallurgical test results; bulk density, groundwater, geotechnical and rock characteristics; potential	• Overview of exploration data leading to selection of drill targets provided.
	The nature and scale of planned further work (e.g., tests for lateral extensions or depth extensions or large-scale step-out drilling).	• Further drilling will be undertaken to confirm, infill and extend known mineralisation.