# MAIDEN RESOURCE AT MADUBE PAN INCREASES LITHIUM CLAY RESOURCE TO 327,000 LCE TONS

## HIGHLIGHTS

- Maiden Mineral Resource estimate of 13,716,390 tons at an average grade of 553 ppm declared over the Madube Pan using a 500ppm Li cut-off, for 40,375 tons of $Li_2CO_3$ Equivalent **(LCE)**, from drilling conducted at the Madube Pan[1]
- **Overall Mineral Resources at Bitterwasser Clay Project Pans increased** from 286,909 LCE tons[2] **to 327,284 LCE tons**
- Clear trend from drilling outlined that grade increased to depth with holes ending at >900ppm Li
- In addition, cyclone test work to be conducted on Madube Pan samples to determine potential for grade increase, such as at the Eden Pan where grade increased by 28%
- Overall Mineral Resource covers only two of fourteen known pans present in the Bitterwasser Pan District
- Future exploration over the Bitterwasser Pan District is aimed at reaching an overall Mineral Resource containing 500,000 tons LCE

**Arcadia Minerals Ltd (ASX:AM7, FRA:8OH) (Arcadia or the Company**), the diversified exploration company targeting a suite of projects aimed at Tantalum, Lithium, Nickel, Copper and Gold in Namibia, is pleased to announce the declaration of a JORC Mineral Resource estimate over the Madube clay deposit at the Bitterwasser Lithium-in-Clay Project situated over EPL 5354.

**Philip le Roux, the Chief Executive Officer of Arcadia stated:** *"We are pleased with the progress we are making in increasing the overall Lithium-in-Clay Mineral Resource at*

[1] Refer to ASX Announcement 22 November 2022 "*Lithium confirmed at the Madube Pan with 44% thicker green clay unit than Eden Pan*"

[2] Refer to ASX Announcement dated 24 August 2022 "*Over 500% increase in Lithium Resource with 287Kt of LCE declared at Bitterwasser*"



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*Bitterwasser. As we continue to receive confirmation of earlier results[3] that mineralisation provenance processes occurred through deep-seated geothermal heat sources and given that the tenor of mineralisation at Madube is similar to that of the Eden Pan, we are confident that we would be able to increase the overall Bitterwasser Lithium-in-Clay Mineral Resource to greater than 500kt of LCE from other pans in the same geological environment. Also, as a clear Lithium increase trend occurs from surface to the depths achieved with hand drilled auger methods, we anticipate this trend to continue deeper into the pan ore body after using mechanised core drilling."*

**Madube Pan Mineral Resource Statement Summary**

Creo Design (Pty) Ltd **(Creo)** has been commissioned by the holder of EPL 5354, Bitterwasser Lithium Exploration (Pty) Ltd **(BLE)**, to prepare a Maiden Mineral Resource estimate on the Madube Pan lithium project over the Bitterwasser Lithium in Clay Project in Namibia.

The Madube Pan forms part of the larger Bitterwasser Pan District where the Eden Pan also contains a Mineral Resource[2]. A total of 24 holes were drilled[4] at the Madube Pan. The Bitterwasser Lithium-in-Clay Project comprises three exploration licenses, EPLs 5353, 5354, and 5358, all of which are held by BLE.

BLE is in the process of developing the Bitterwasser Lithium in Clay project, which is situated in the western part of the Kalahari Desert in an area that is characterised by wide expanses on Karoo geology substrate, covered by red Kalahari sand dunes and well-developed saltpans. Work to date was mainly done over the neighbouring Eden Pan situated on the farm Eden, between the settlements of Kalkrand and Hoachanas in the Hardap Region of central Namibia. After completing exploration work at the Eden Pan, which work led to the establishment of an Inferred Mineral Resource of 85.2 Mt @ 633 ppm amounting to 286,909 tons LCE[2],the attention shifted to the neighbouring Mabube Pan on the farm Madube some 9km north of the Eden pan. Madube Pan is covered by EPL 5354. The EPL is valid until June 2023 and a renewal application has already been lodged with the Ministry of Mines, which permits BLE to continue undertaking prospecting activities over this property.

**Madube Pan Maiden Mineral Resource Estimate**

Drilling work conducted since October 2022 over the Madube Pan involved hand-auger drilling and the shallow drilling of 23 vertical holes across the strike of the central portion of the pan[5]. The drillholes were spaced on a 500 x 500 m grid comprising 3 drill lines with 2 to 4

[3] Refer to ASX Announcement dated 9 May 2022 "*Regional Study Advances Work Program for District Scale Lithium-in-Brines"*

[4] Refer to ASX Announcement 10 October 2022 "*Drilling Indicates Potential to Grow Lithium Resource*"

[5] Refer to Appendix 1, Figure 2 and Table 1 for location and drill information.

boreholes per line. The aggregate drilling meterage was 213.6m. The area covered by the drilling grid is approximately 512 ha in extent and represents the total area of the Madube pan, which also overlays an anomalous electrical-conductive body identified during the airborne electromagnetic conductivity survey[6].

The drilling produced a total of 195 auger-hole samples, with 181 samples taken for chemical analysis, while the remaining 14 samples were used for QA/QC purposes.

The Bitterwasser Pan complex was subjected to optimal geological and environmental conditions required for the development of significant lithium clay and brine deposits. Such requirements include, but are not limited to, a geographic placing within arid latitudinal belt, presence of Cenozoic-aged fault-bound terrestrial sedimentary basins, proximity to older felsic, carbonatitic and/or alkali volcanic sequences and the presence of regionally extensive brine aquifers.
The Bitterwasser Pan complex on the eastern edge of the Bitterwasser basin comprises seven individual lithium-, potassium- and boron bearing clay substrate saltpans and is associated with the depositional development of the western portions of the greater Kalahari basin[7].

Elevated groundwater temperatures, as high as 39°C, have been reported from water-supply boreholes in close vicinity to the saltpans, suggesting a deep-seated geothermal heat source and mineralisation provenance.

The pans occur as large depressions in the arid western part of the Kalahari Basin, containing high amounts of montmorillonite group clays, in particular lithium bearing zinnwaldite. The high salinity silty clay soils occur as several alternating horizons. The thickness of the sedimentary packages, which make up the Bitterwasser saltpan substrate ranges between 30m to 100m thick and are of sufficient size and porosity to accommodate substantial brine aquifers.

The exploration programme at the Madube Pan was aimed at characterizing the general stratigraphic sequence and to investigate the pan's lithium potential in terms of economic viability[8].

Auger sampling confirmed the presence of a lithium rich clay resource comparable in grade and extent to that owned by major exploration companies in Nevada, USA. In addition, it was

[6] Refer to ASX Announcement 9 November 2022 "*Geophysical Anomaly at Lithium in Brines at Bitterwasser*" and to ASX Announcement of 6 February 2023 "*Bitterwasser Geophysical Interpretation Define Drill Targets*"
[7] Refer to Appendix 1, Figure 1.
[8] Refer to Appendix 1 Table 2 for the stratigraphic logging of the auger holes.

found that the geological and environmental requirements for the formation of significant lithium clay and brine deposits are present. However, the lithium grade in the brines is yet to be confirmed through appropriate exploration techniques[9]. Sufficient evidence exists to suggest the presence of a significant lithium bearing clay resource in the Bitterwasser saltpan complex, which is currently confined to a Mineral Resource over the Eden Pan[2].

The clay drill samples were split into two sub-samples; one split was used for sodium peroxide fusion ICP-OES with an ICP-MS finish for analysis of Li (ppm) and K (%) and the remaining subsample for initial sequential leach (metallurgical) test work. No analysis for boron was done[10].

The Lithium-clay mineralisation intersected at the Madube Pan was found to be spatially continuous, trending moderately sub-parallel to the long axis of the Madube Pan. The clays increased in thickness and lithium content towards the central portions of the pan where Li grades of some 990ppm were encountered, which is in-line with similar projects situated within known and productive lithium mines in other parts of the world where lithium is exploited economically at present.
A clear Li increase trend from approximately 400 ppm Li at surface to >900 ppm Li at the end of the holes is evident from the sample analysis. Potassium follows a similar trend but with a sudden increase at about 8 metres below surface from 1,6% K to 2,6% K.

The quality of the data provided and used by BLE is considered to be consistent for the reporting of Mineral Resources in accordance with the JORC Code.

Geology and mineralisation domain modelling of the Madube Pan data was conducted using Leapfrog Geo™ software[11]. Here two main mineralised domains were interpreted (Upper and Middle Domains) and were modelled on various a lower cut-off grades ranging from 0 to 600 ppm Li. Bitterwasser Lithium decided to use a cut-off grade of 500 ppm Li for the MRE. The main mineralised domains are located within the previously broadly delineated mineralised Upper Clay and Middle Clay Units. Grade estimation was undertaken using ordinary Kriging and the estimation approach to be considered appropriate based on review of a number of factors, including the quantity and spacing of available data, the interpreted controls on mineralisation, and the style and geometry of mineralisation.

[9] Refer to ASX Announcement 6 February 2023 "*Bitterwasser Geophysical Interpretation Define Drill Targets*"
[10] Refer to Appendix 1, Table 2 for assay results.
[11] Refer to Appendix 1, Figure 3 for geological model of the Madube Pan.

Both simple and ordinary Kriging estimation methodologies were undertaken for the estimation of Li (ppm) and K% in the Upper and Middle domains. The search neighbourhood ranges were determined from the variography. Simple Kriging includes the global mean grade as a constituent of the Kriging equation and was used primarily in areas which are not well supported by data. The mean grade of the population was included as part of the estimate and for this exercise ordinary Kriging was used.

Creo considered that the quality of the drilling, sampling, sample preparation and sample handling to be of a high standard. Sampling and sample processing were considered sufficient to delineate a Mineral Resource to the level of confidence required by JORC. This resulted in the entire Madube Pan area explored by Bitterwasser Lithium to be classified as an Inferred Mineral Resource.

Based on the information presented, Creo considered the data collection procedures applied during the sampling phase appropriate and the sample database suitable for the purpose of resource estimation.

Creo concluded that the understanding of the geological and grade continuity at the Madube Pan is understood with a moderate degree of confidence, and the quantity of data is sufficient to estimate and declare Mineral Resources in the Inferred category following the guidelines and procedures within the context of JORC (2012).

**Summary of estimated JORC compliant Mineral Resource for the Madube Pan at the Bitterwasser Lithium in Clays Project**

| CATEGORY | UNIT | TONNAGE ton | GRADE Li ppm | Material Content | |
|---|---|---|---|---|---|
| | | | | LCE (t) | CONTAINED Li ton |
| | **Cut-off Grade of 0 ppm Li** | | | | |
| **Indicated** | Upper | - | - | - | - |
| | Middle | - | - | - | - |
| | Total Indicated | - | - | - | - |
| **Inferred** | Upper | 27 118 188 | 339 | 49 003 | 9 206 |
| | Middle | 50 108 942 | 433 | 115 536 | 21 705 |
| | Total Inferred | **77 227 130** | **400** | **164 539** | **30 911** |
| | **Cut-off Grade of 500 ppm Li** | | | | |
| **Indicated** | Upper | - | - | - | - |
| | Middle | - | - | - | - |
| | Total Indicated | - | - | - | - |
| **Inferred** | Upper | - | - | - | - |
| | Middle | 13 716 390 | 553 | 40 375 | 7 585 |
| | Total Inferred | **13 716 390** | **553** | **40 375** | **7 585** |

**The overall (combined) inferred Mineral Resource for the Eden[12] and Madube pans:**

| Stratigraphic Unit | Tonnes | Average Value | | Material Content | |
|---|---|---|---|---|---|
| | | Li (ppm) | K% | Li (t) | LCE (t) |
| Upper | 28 192 877 | 557 | 1.54 | 15 699 | 83 566 |
| Middle | 70 672 141 | 648 | 1.78 | 45 786 | 243 719 |
| **Total** | **98 865 018** | **622** | **1.71** | **61 485** | **327 285** |

[12] Refer to ASX Announcement dated 24 August 2022 "*Over 500% increase in Lithium Resource with 287Kt of LCE declared at Bitterwasser*"

The following work will be conducted to increase the confidence of the Madube pan deposit and increase the Madube Mineral Resource estimate from Inferred to Indicated/Measured:

- a dedicated programme of diamond core drilling in order to confirm the geometry, stratigraphy, grade and controls on the mineralisation at depth, in the Lower Clays Unit.
- investigate the potential of lateral continuation of the pan sediments below the dunes flanking the Madube Pan.
- accurately survey the Madube borehole collars and remodel the data with revised the high resolution bore hole collar survey results.

In addition to the Madube and Eden Pans, six neighbouring pans (on the Eastern Edge of the Bitterwasser Pan District) and six pans elsewhere over the Bitterwasser Pan District remain unexplored and will receive attention in future exploration phases.

**This announcement has been authorised for release by the directors of Arcadia Minerals Limited.**

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## APPENDIX 1 – Project and Drillhole Locations

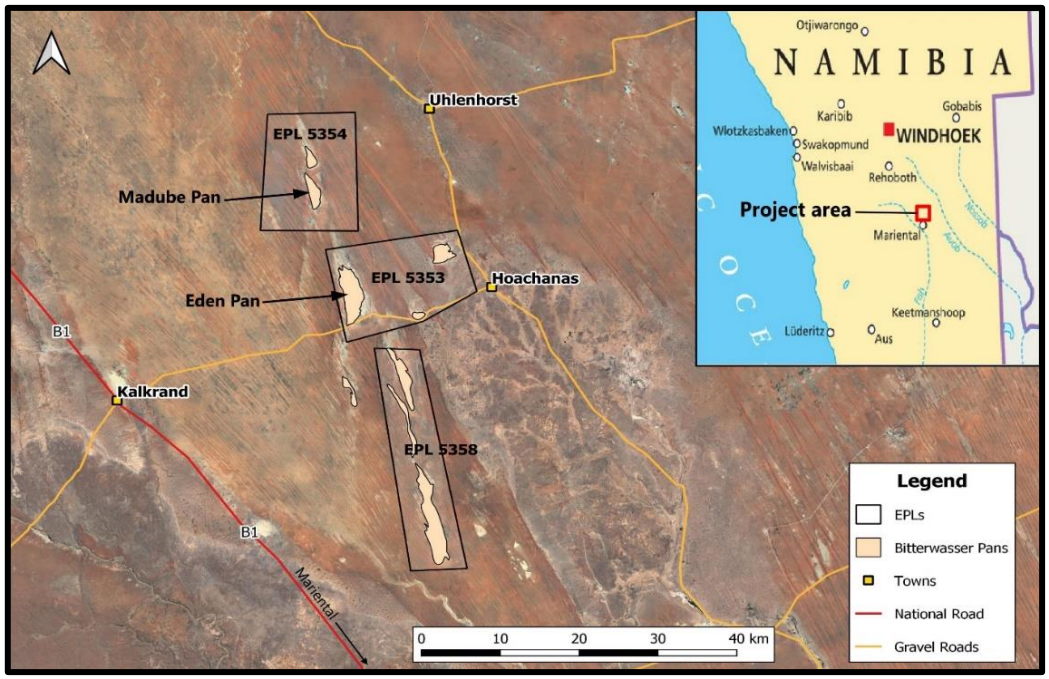


***Figure 1: Location of the Bitterwasser Lithium Project area, associated EPLs and the Madube Pan.***

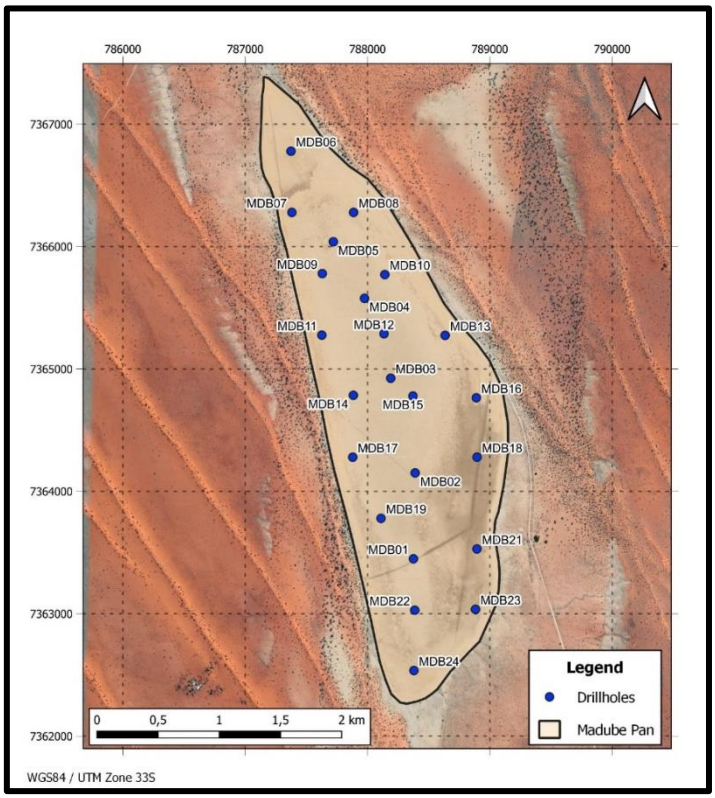


**Figure 2:** ***Drillhole positions and numbers of the auger drilling programme at the Madube Pan.***

**APPENDIX 1 – CONTINUED**

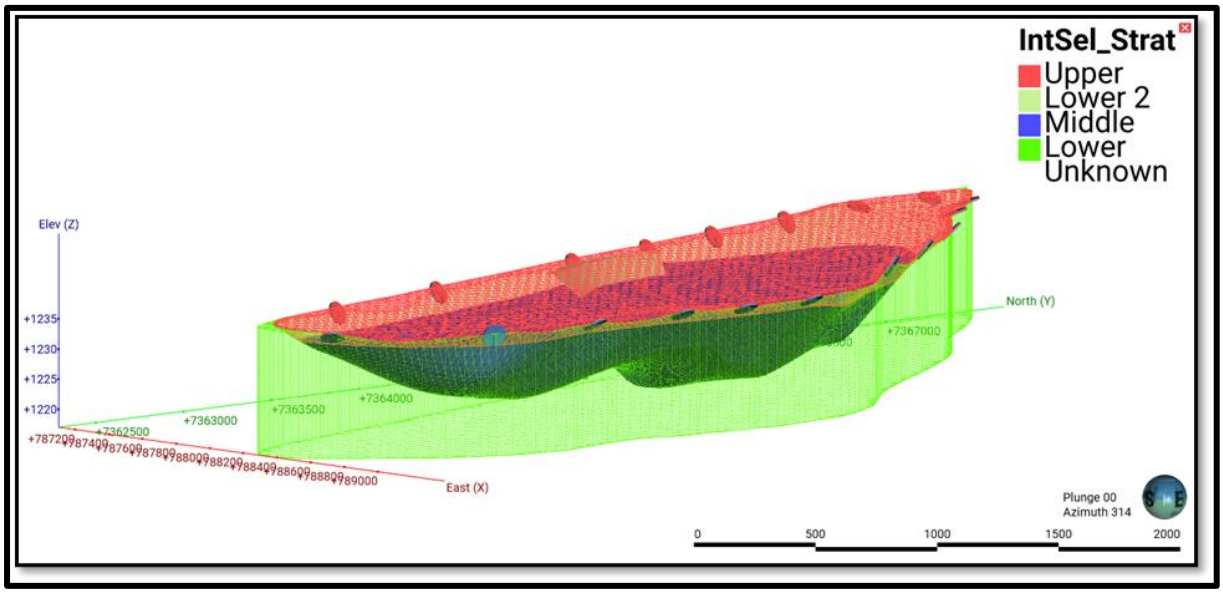


**Figure 3 :** *3D geological model of the Madube Pan*

***Table 1: List of all auger holes which were drilled as a part of the drilling programme.***

| Auger _ID | WGS84_ UTM33S_X | WGS84_ UTM33S_Y | Elevation | Azimuth | Inclination | Date From | Date To | EOH |
|---|---|---|---|---|---|---|---|---|
| **MDB01** | 788375 | 7363449 | 1237 | N/A | -90 | 10/10/2022 | 12/10/2022 | 15.00 |
| **MDB02** | 788389 | 7364151 | 1237 | N/A | -90 | 5/10/2022 | 6/10/2022 | 12.00 |
| **MDB03** | 788189 | 7364924 | 1237 | N/A | -90 | 12/10/2022 | 14/10/2022 | 17.80 |
| **MDB04** | 787975 | 7365577 | 1237 | N/A | -90 | 14/10/2022 | 21/10/2022 | 16.00 |
| **MDB05** | 787720 | 7366039 | 1237 | N/A | -90 | 21/10/2022 | 11/11/2022 | 10.20 |
| **MDB06** | 787374 | 7366779 | 1237 | N/A | -90 | 11/11/2022 | 11/11/2022 | 3.00 |
| **MDB07** | 787381 | 7366279 | 1237 | N/A | -90 | 12/11/2022 | 12/11/ 2022 | 4.80 |
| **MDB08** | 787886 | 7366279 | 1237 | N/A | -90 | 12/11/ 2022 | 12/11/2022 | 3.00 |
| **MDB09** | 787630 | 7365779 | 1237 | N/A | -90 | 12/11/ 2022 | 14/11/2022 | 12.40 |
| **MDB10** | 788141 | 7365771 | 1237 | N/A | -90 | 12/11/2022 | 14/11/2022 | 14.60 |
| **MDB11** | 787626 | 7365276 | 1237 | N/A | -90 | 15/11/2022 | 15/11/2022 | 5.40 |
| **MDB12** | 788134 | 7365287 | 1237 | N/A | -90 | 15/11/2022 | 18/11/2022 | 19.00 |
| **MDB13** | 788634 | 7365274 | 1237 | N/A | -90 | 15/11/2022 | 16/11/2022 | 7.60 |
| **MDB14** | 787884 | 7364785 | 1237 | N/A | -90 | 17/11/2022 | 18/11/2022 | 19.00 |
| **MDB15** | 788371 | 7364779 | 1237 | N/A | -90 | 18/11/2022 | 28/11/2022 | 14.40 |
| **MDB16** | 788889 | 7364764 | 1237 | N/A | -90 | 18/11/2022 | 18/11/2022 | 1.20 |
| **MDB17** | 787879 | 7364279 | 1237 | N/A | -90 | 18/11/2022 | 18/11/2022 | 5.40 |
| **MDB18** | 788895 | 7364279 | 1237 | N/A | -90 | 28/11/2022 | 29/11/2022 | 1.40 |
| **MDB19** | 788110 | 7363779 | 1237 | N/A | -90 | 28/11/2022 | 29/11/2022 | 16.20 |
| **MDB20** | 788634 | 7363756 | | N/A | -90 | Cancelled | | |
| **MDB21** | 788894 | 7363529 | 1237 | N/A | -90 | 29/11/2022 | 29/11/2022 | 1.20 |
| **MDB22** | 788386 | 7363029 | 1237 | N/A | -90 | 29/11/2022 | 30/11/2022 | 3.8 |
| **MDB23** | 788882 | 7363036 | 1237 | N/A | -90 | 30/11/2022 | 1/12/2022 | 7.00 |
| **MDB24** | 788379 | 7362536 | 1237 | N/A | -90 | 30/11/2022 | 1/12/2022 | 3.20 |

***Table 2: Summarized stratigraphic log of all the auger drillholes.***

| Auger ID | DCSC To (m.b.g.l) | LBGSC To (m.b.g.l) | MSC To (m.b.g.l) | MGPC To (m.b.g.l) | GGPC To (m.b.g.l) | OGPC To (m.b.g.l) | Upper Unit thickness | Middle Unit thickness |
|---|---|---|---|---|---|---|---|---|
| **MDB01** | 0.20 | 1.60 | 2.60 | 5.20 | 14.60 | 15.00 | 2.60 | 12.40 |
| **MDB02** | 0.20 | 1.40 | 2.80 | 8.60 | 11.80 | | 2.80 | 9.00 |
| **MDB03** | 0.40 | 2.60 | 3.40 | 7.20 | 11.40 | 17.60 | 3.40 | 14.20 |
| **MDB04** | 0.40 | 2.20 | 4.00 | 6.00 | 15.00 | | 4.00 | 11.00 |
| **MDB05** | 0.40 | 1.00 | 3.40 | 5.60 | 10.20 | | 3.40 | 6.80 |
| **MDB06** | 1.20 | 3.00 | | | | | 3.00 | |
| **MDB07** | 1.20 | 3.40 | | | | | 3.40 | |
| **MDB08** | 1.40 | 3.00 | | | | | 3.00 | |
| **MDB09** | 0.40 | 2.40 | 3.80 | | 12.40 | | 3.80 | 8.60 |
| **MDB10** | 0.20 | 2.20 | 4.40 | 5.00 | 14.60 | | 4.40 | 10.20 |
| **MDB11** | 0.20 | 1.20 | 1.60 | 3.40 | 4.80 | | 1.60 | 3.20 |
| **MDB12** | 0.20 | 2.60 | 4.00 | 5.40 | 16.00 | 19.00 | 4.00 | 15.00 |
| **MDB13** | 0.40 | 1.20 | 7.60 | | | | 7.60 | |
| **MDB14** | 0.20 | 2.20 | 3.00 | 8.00 | 9.40 | 19.00 | 3.00 | 16.00 |
| **MDB15** | 0.40 | 2.40 | 4.60 | 6 | 8 | 14.40 | 4.60 | 9.80 |
| **MDB16** | 0.40 | 1.00 | | | | | 1.00 | |
| **MDB17** | 0.40 | 1.00 | 2.20 | 4.80 | | | 2.20 | 2.60 |
| **MDB18** | 0.80 | 1.40 | | | | | 1.40 | |
| **MDB19** | 0.20 | 3.00 | 3.80 | 7.00 | 13.00 | 16.20 | 3.80 | 12.40 |
| **MDB21** | 0.40 | 1.20 | | | | | 1.20 | |
| **MDB22** | 0.40 | 3.00 | 3.80 | | | | 3.80 | |
| **MDB23** | 0.40 | 1.80 | 2.80 | 7.00 | | | 2.80 | 4.20 |
| **MDB24** | 0.20 | 0.80 | | 3.20 | | | 0.80 | 2.40 |

***Table 3 – List of sampling analyses results***

| Hole_ID | Sample_ID | Lab_Report | From | To | Width | Li_ppm | K_% |
|---|---|---|---|---|---|---|---|
| MDB01 | Y0001 | 1122-6721 | 0.00 | 0.40 | 0.40 | 243.23 | 2.04 |
| MDB01 | Y0002 | 1122-6721 | 0.40 | 1.20 | 0.80 | 361.92 | 2.41 |
| MDB01 | Y0003 | 1122-6721 | 1.20 | 2.00 | 0.80 | 426.00 | 2.29 |
| MDB01 | Y0004 | 1122-6721 | 2.00 | 3.00 | 1.00 | 485.68 | 2.15 |
| MDB01 | Y0005 | 1122-6721 | 3.00 | 4.20 | 1.20 | 496.13 | 2.35 |
| MDB01 | Y0006 | 1122-6721 | 4.20 | 5.40 | 1.20 | 559.70 | 1.94 |
| MDB01 | Y0007 | 1122-6721 | 5.40 | 6.20 | 0.80 | 649.19 | 2.08 |
| MDB01 | Y0008 | 1122-6721 | 6.20 | 6.80 | 0.60 | 586.50 | 2.41 |
| MDB01 | Y0009 | 1122-6721 | 6.80 | 8.00 | 1.20 | 551.47 | 2.16 |
| MDB01 | Y0010 | 1122-6721 | 8.00 | 8.40 | 0.40 | 439.04 | 2.2 |
| MDB01 | Y0011 | 1122-6721 | 8.40 | 10.00 | 1.60 | 562.75 | 2.13 |
| MDB01 | Y0012 | 1122-6721 | 10.00 | 10.60 | 0.60 | 502.21 | 1.92 |
| MDB01 | Y0013 | 1122-6721 | 10.60 | 11.20 | 0.60 | 539.16 | 1.63 |
| MDB01 | Y0014 | 1122-6721 | 11.20 | 12.80 | 1.60 | 710.23 | 1.59 |
| MDB01 | Y0015 | 1122-6721 | 12.80 | 14.00 | 1.20 | 634.95 | 2.42 |
| MDB01 | Y0016 | 1122-6721 | 14.00 | 15.00 | 1.00 | 672.05 | 2.42 |
| MDB02 | Y0017 | 1122-6721 | 0.00 | 0.60 | 0.60 | 255.02 | 2.14 |
| MDB02 | Y0018 | 1122-6721 | 0.60 | 1.40 | 0.80 | 349.52 | 2.25 |
| MDB02 | Y0019 | 1122-6721 | 1.40 | 2.60 | 1.20 | 493.67 | 2.39 |
| MDB02 | Y0021 | 1122-6721 | 2.60 | 3.20 | 0.60 | 470.14 | 1.99 |
| MDB02 | Y0022 | 1122-6721 | 3.20 | 4.60 | 1.40 | 464.89 | 2.54 |
| MDB02 | Y0023 | 1122-6721 | 4.60 | 5.20 | 0.60 | 552.00 | 2.64 |
| MDB02 | Y0024 | 1122-6721 | 5.20 | 6.00 | 0.80 | 536.61 | 2.08 |
| MDB02 | Y0025 | 1122-6721 | 6.00 | 6.60 | 0.60 | 561.32 | 2.18 |
| MDB02 | Y0026 | 1122-6721 | 6.60 | 7.60 | 1.00 | 514.79 | 2.26 |
| MDB02 | Y0027 | 1122-6721 | 7.60 | 8.60 | 1.00 | 416.00 | 2.23 |
| MDB02 | Y0028 | 1122-6721 | 8.60 | 9.20 | 0.60 | 495.99 | 2.01 |
| MDB02 | Y0029 | 1122-6721 | 9.20 | 10.00 | 0.80 | 463.68 | 1.99 |
| MDB02 | Y0030 | 1122-6721 | 10.00 | 10.80 | 0.80 | 403.91 | 2.07 |
| MDB02 | Y0031 | 1122-6721 | 10.80 | 12.00 | 1.20 | 333.98 | 1.81 |
| MDB03 | Y0032 | 1222-6807 | 0.00 | 0.40 | 0.40 | 256.82 | 1.94 |
| MDB03 | Y0033 | 1222-6807 | 0.40 | 1.40 | 1.00 | 367.46 | 2.22 |
| MDB03 | Y0034 | 1222-6807 | 1.40 | 2.60 | 1.20 | 447.88 | 2.22 |
| MDB03 | Y0035 | 1222-6807 | 2.60 | 3.40 | 0.80 | 509.60 | 1.91 |
| MDB03 | Y0036 | 1222-6807 | 3.40 | 4.20 | 0.80 | 490.27 | 2.23 |
| MDB03 | Y0037 | 1222-6807 | 4.20 | 5.00 | 0.80 | 558.55 | 1.92 |

| Hole_ID | Sample_ID | Lab_Report | From | To | Width | Li_ppm | K_% |
|---|---|---|---|---|---|---|---|
| MDB03 | Y0038 | 1222-6807 | 5.00 | 5.80 | 0.80 | 607.52 | 1.35 |
| MDB03 | Y0039 | 1222-6807 | 5.80 | 7.20 | 1.40 | 609.89 | 1.35 |
| MDB03 | Y0041 | 1222-6807 | 7.20 | 8.00 | 0.80 | 608.28 | 2.27 |
| MDB03 | Y0042 | 1222-6807 | 8.00 | 9.00 | 1.00 | 519.05 | 1.9 |
| MDB03 | Y0043 | 1222-6807 | 9.00 | 10.20 | 1.20 | 602.68 | 2.45 |
| MDB03 | Y0044 | 1222-6807 | 10.20 | 11.00 | 0.80 | 628.67 | 2.16 |
| MDB03 | Y0045 | 1222-6807 | 11.00 | 11.60 | 0.60 | 659.44 | 1.92 |
| MDB03 | Y0046 | 1222-6807 | 11.60 | 13.00 | 1.40 | 765.65 | 1.59 |
| MDB03 | Y0047 | 1222-6807 | 13.00 | 14.00 | 1.00 | 812.28 | 2.49 |
| MDB03 | Y0048 | 1222-6807 | 14.00 | 15.40 | 1.40 | 719.94 | 2.41 |
| MDB03 | Y0049 | 1222-6807 | 15.40 | 16.80 | 1.40 | 626.20 | 2.16 |
| MDB03 | Y0050 | 1222-6807 | 16.80 | 17.80 | 1.00 | 677.14 | 2.01 |
| MDB04 | Y0051 | 1222-6807 | 0.40 | 1.40 | 1.00 | 361.03 | 2.15 |
| MDB04 | Y0052 | 1222-6807 | 1.40 | 2.40 | 1.00 | 503.57 | 2.26 |
| MDB04 | Y0053 | 1222-6807 | 2.40 | 3.00 | 0.60 | 546.57 | 2.14 |
| MDB04 | Y0054 | 1222-6807 | 3.00 | 4.00 | 1.00 | 492.77 | 2.34 |
| MDB04 | Y0055 | 1222-6807 | 4.00 | 5.00 | 1.00 | 548.31 | 2.26 |
| MDB04 | Y0056 | 1222-6807 | 6.00 | 7.40 | 1.40 | 576.64 | 1.97 |
| MDB04 | Y0057 | 1222-6807 | 7.40 | 8.60 | 1.20 | 539.34 | 2.01 |
| MDB04 | Y0058 | 1222-6807 | 8.60 | 9.40 | 0.80 | 516.44 | 1.66 |
| MDB04 | Y0059 | 1222-6807 | 9.40 | 10.80 | 1.40 | 706.77 | 2.09 |
| MDB04 | Y0061 | 1222-6807 | 10.80 | 12.60 | 1.80 | 732.45 | 1.83 |
| MDB04 | Y0062 | 1222-6807 | 12.60 | 13.60 | 1.00 | 413.17 | 2.16 |
| MDB04 | Y0063 | 1222-6807 | 13.60 | 14.40 | 0.80 | 184.36 | 2.06 |
| MDB04 | Y0064 | 1222-6807 | 14.40 | 15.00 | 0.60 | 486.27 | 2.95 |
| MDB04 | Y0065 | 1222-6807 | 15.00 | 16.00 | 1.00 | 519.30 | 3.1 |
| MDB05 | Y0066 | 0123-6823 | 0.00 | 0.40 | 0.40 | 243.23 | 2.12 |
| MDB05 | Y0067 | 0123-6823 | 0.40 | 1.00 | 0.60 | 347.74 | 2.21 |
| MDB05 | Y0068 | 0123-6823 | 1.00 | 2.40 | 1.40 | 428.69 | 2.26 |
| MDB05 | Y0069 | 0123-6823 | 2.40 | 3.40 | 1.00 | 455.62 | 2.14 |
| MDB05 | Y0070 | 0123-6823 | 3.40 | 4.40 | 1.00 | 900.28 | 4.26 |
| MDB05 | Y0071 | 0123-6823 | 4.40 | 5.60 | 1.20 | 444.16 | 2.18 |
| MDB05 | Y0072 | 0123-6823 | 5.60 | 7.00 | 1.40 | 441.73 | 2.24 |
| MDB05 | Y0073 | 0123-6823 | 7.00 | 8.00 | 1.00 | 424.65 | 1.83 |
| MDB05 | Y0074 | 0123-6823 | 8.00 | 9.00 | 1.00 | 488.45 | 2.12 |
| MDB05 | Y0075 | 0123-6823 | 9.00 | 10.20 | 1.20 | 491.79 | 1.69 |
| MDB06 | Y0076 | 0123-6823 | 0.00 | 1.20 | 1.20 | 282.17 | 1.89 |
| MDB06 | Y0077 | 0123-6823 | 1.20 | 3.00 | 1.80 | 240.52 | 2.28 |
| MDB07 | Y0078 | 0123-6823 | 0.00 | 1.20 | 1.20 | 287.04 | 1.79 |
| MDB07 | Y0079 | 0123-6823 | 1.20 | 3.40 | 2.20 | 204.91 | 2.1 |

| Hole_ID | Sample_ID | Lab_Report | From | To | Width | Li_ppm | K_% |
|---|---|---|---|---|---|---|---|
| MDB07 | Y0081 | 0123-6823 | 3.40 | 4.80 | 1.40 | 113.24 | 2.52 |
| MDB08 | Y0082 | 0123-6823 | 0.00 | 3.00 | 3.00 | 333.23 | 2.04 |
| MDB09 | Y0083 | 0123-6823 | 0.00 | 2.40 | 2.40 | 355.18 | 2.14 |
| MDB09 | Y0084 | 0123-6823 | 2.40 | 3.80 | 1.40 | 414.31 | 2 |
| MDB09 | Y0085 | 0123-6823 | 3.80 | 4.60 | 0.80 | 432.20 | 2.13 |
| MDB09 | Y0086 | 0123-6823 | 4.60 | 6.00 | 1.40 | 355.35 | 1.62 |
| MDB09 | Y0087 | 0123-6823 | 6.00 | 7.00 | 1.00 | 377.94 | 1.84 |
| MDB09 | Y0088 | 0123-6823 | 7.00 | 8.00 | 1.00 | 375.47 | 1.69 |
| MDB09 | Y0089 | 0123-6823 | 8.00 | 9.00 | 1.00 | 410.65 | 1.65 |
| MDB09 | Y0090 | 0123-6823 | 9.00 | 10.00 | 1.00 | 417.61 | 1.85 |
| MDB09 | Y0091 | 0123-6823 | 10.00 | 11.00 | 1.00 | 481.43 | 1.71 |
| MDB09 | Y0092 | 0123-6823 | 11.00 | 12.40 | 1.40 | 283.55 | 1.8 |
| MDB10 | Y0093 | 0123-6823 | 0.00 | 3.00 | 3.00 | 354.55 | 2.25 |
| MDB10 | Y0094 | 0123-6823 | 3.00 | 4.40 | 1.40 | 390.29 | 2.21 |
| MDB10 | Y0095 | 0123-6823 | 4.40 | 6.00 | 1.60 | 344.09 | 1.95 |
| MDB10 | Y0096 | 0123-6823 | 6.00 | 7.00 | 1.00 | 311.94 | 1.82 |
| MDB10 | Y0097 | 0123-6823 | 7.00 | 8.00 | 1.00 | 370.62 | 1.88 |
| MDB10 | Y0098 | 0123-6823 | 8.00 | 9.00 | 1.00 | 393.54 | 2.17 |
| MDB10 | Y0099 | 0123-6823 | 9.00 | 10.00 | 1.00 | 363.00 | 1.94 |
| MDB10 | Y0101 | 0123-6823 | 10.00 | 11.00 | 1.00 | 385.10 | 2.08 |
| MDB10 | Y0102 | 0123-6823 | 11.00 | 12.00 | 1.00 | 370.71 | 1.95 |
| MDB10 | Y0103 | 0123-6823 | 12.00 | 13.20 | 1.20 | 310.18 | 1.62 |
| MDB10 | Y0108 | 0123-6823 | 13.00 | 13.80 | 0.80 | 201.08 | 0.85 |
| MDB10 | Y0109 | 0123-6823 | 13.80 | 14.60 | 0.80 | 189.50 | 2.59 |
| MDB11 | Y0104 | 0123-6823 | 0.00 | 1.60 | 1.60 | 329.60 | 2.07 |
| MDB11 | Y0105 | 0123-6823 | 1.60 | 3.00 | 1.40 | 195.10 | 1.88 |
| MDB11 | Y0106 | 0123-6823 | 3.00 | 4.00 | 1.00 | 161.88 | 1.92 |
| MDB11 | Y0107 | 0123-6823 | 4.00 | 5.40 | 1.40 | 102.26 | 1.82 |
| MDB12 | Y0110 | 0123-6823 | 0.00 | 2.60 | 2.60 | 357.39 | 2.05 |
| MDB12 | Y0111 | 0123-6823 | 2.60 | 4.00 | 1.40 | 443.28 | 1.97 |
| MDB12 | Y0112 | 0123-6823 | 4.00 | 5.40 | 1.40 | 468.39 | 2.14 |
| MDB12 | Y0113 | 0123-6823 | 5.40 | 7.00 | 1.60 | 525.46 | 1.19 |
| MDB12 | Y0114 | 0123-6823 | 7.00 | 8.00 | 1.00 | 575.32 | 1.79 |
| MDB12 | Y0115 | 0123-6823 | 8.00 | 9.00 | 1.00 | 488.96 | 1.8 |
| MDB12 | Y0116 | 0123-6823 | 9.00 | 10.00 | 1.00 | 554.73 | 1.7 |
| MDB12 | Y0117 | 0123-6823 | 10.00 | 11.00 | 1.00 | 614.93 | 2.2 |
| MDB12 | Y0118 | 0123-6823 | 11.00 | 12.00 | 1.00 | 643.34 | 2.02 |
| MDB12 | Y0119 | 0123-6823 | 12.00 | 13.00 | 1.00 | 612.87 | 2.27 |
| MDB12 | Y0121 | 0123-6823 | 13.00 | 14.00 | 1.00 | 616.64 | 1.77 |
| MDB12 | Y0122 | 0123-6823 | 14.00 | 15.00 | 1.00 | 585.60 | 2.82 |

| Hole_ID | Sample_ID | Lab_Report | From | To | Width | Li_ppm | K_% |
|---|---|---|---|---|---|---|---|
| MDB12 | Y0123 | 0123-6823 | 15.00 | 16.00 | 1.00 | 608.05 | 2.47 |
| MDB12 | Y0124 | 0123-6823 | 16.00 | 17.00 | 1.00 | 654.43 | 2.66 |
| MDB12 | Y0125 | 0123-6823 | 17.00 | 18.00 | 1.00 | 669.07 | 1.78 |
| MDB12 | Y0126 | 0123-6823 | 18.00 | 19.00 | 1.00 | 686.02 | 1.56 |
| MDB13 | Y0127 | 0123-6823 | 0.00 | 1.00 | 1.00 | 249.51 | 1.74 |
| MDB13 | Y0128 | 0123-6823 | 2.00 | 4.00 | 2.00 | 131.69 | 1.56 |
| MDB13 | Y0129 | 0123-6823 | 4.00 | 6.60 | 2.60 | 126.27 | 1.47 |
| MDB13 | Y0130 | 0123-6823 | 6.60 | 7.60 | 1.00 | 110.40 | 1.22 |
| MDB14 | Y0131 | 0123-6823 | 0.00 | 3.00 | 3.00 | 351.79 | 2.12 |
| MDB14 | Y0132 | 0123-6823 | 3.00 | 4.00 | 1.00 | 480.92 | 2.22 |
| MDB14 | Y0133 | 0123-6823 | 4.00 | 5.00 | 1.00 | 425.16 | 2.18 |
| MDB14 | Y0134 | 0123-6823 | 5.00 | 6.00 | 1.00 | 424.98 | 2.26 |
| MDB14 | Y0135 | 0123-6823 | 6.00 | 8.00 | 2.00 | 439.48 | 2.05 |
| MDB14 | Y0136 | 0123-6823 | 8.00 | 9.40 | 1.40 | 265.67 | 1.5 |
| MDB14 | Y0137 | 0123-6823 | 9.40 | 11.60 | 2.20 | 97.79 | 1.96 |
| MDB14 | Y0138 | 0123-6823 | 11.60 | 13.00 | 1.40 | 409.83 | 2.16 |
| MDB14 | Y0139 | 0123-6823 | 13.00 | 14.00 | 1.00 | 463.60 | 1.7 |
| MDB14 | Y0141 | 0123-6823 | 14.00 | 16.00 | 2.00 | 520.94 | 1.92 |
| MDB14 | Y0142 | 0123-6823 | 16.00 | 17.00 | 1.00 | 526.60 | 1.89 |
| MDB14 | Y0143 | 0123-6823 | 17.00 | 18.00 | 1.00 | 555.53 | 1.8 |
| MDB14 | Y0144 | 0123-6823 | 18.00 | 19.00 | 1.00 | 650.07 | 1.61 |
| MDB15 | Y0145 | 0123-6864 | 0.00 | 2.40 | 2.40 | 403.44 | 2.23 |
| MDB15 | Y0146 | 0123-6864 | 2.40 | 4.60 | 2.20 | 463.01 | 2.17 |
| MDB15 | Y0147 | 0123-6864 | 4.60 | 6.00 | 1.40 | 541.10 | 1.44 |
| MDB15 | Y0148 | 0123-6864 | 6.00 | 7.00 | 1.00 | 572.52 | 1.38 |
| MDB15 | Y0149 | 0123-6864 | 7.00 | 8.00 | 1.00 | 527.47 | 1.99 |
| MDB15 | Y0150 | 0123-6864 | 8.00 | 9.00 | 1.00 | 468.65 | 1.63 |
| MDB15 | Y0151 | 0123-6864 | 9.00 | 10.00 | 1.00 | 556.67 | 2.11 |
| MDB15 | Y0152 | 0123-6864 | 10.00 | 11.00 | 1.00 | 608.59 | 2.08 |
| MDB15 | Y0153 | 0123-6864 | 11.00 | 12.00 | 1.00 | 621.07 | 1.91 |
| MDB15 | Y0154 | 0123-6864 | 12.00 | 13.00 | 1.00 | 703.51 | 1.78 |
| MDB15 | Y0155 | 0123-6864 | 13.00 | 14.00 | 1.00 | 502.14 | 2.55 |
| MDB15 | Y0156 | 0123-6864 | 14.00 | 14.40 | 0.40 | 340.70 | 2.14 |
| MDB16 | Y0157 | 0123-6864 | 0.00 | 1.20 | 1.20 | 266.38 | 1.93 |
| MDB17 | Y0158 | 0123-6864 | 0.00 | 0.22 | 0.22 | 301.12 | 1.75 |
| MDB17 | Y0159 | 0123-6864 | 2.20 | 4.80 | 2.60 | 286.19 | 1.65 |
| MDB17 | Y0161 | 0123-6864 | 4.80 | 5.40 | 0.60 | 150.25 | 1.72 |
| MDB18 | Y0162 | 0123-6864 | 0.00 | 1.40 | 1.40 | 319.52 | 1.96 |
| MDB19 | Y0164 | 0123-6864 | 0.00 | 3.00 | 3.00 | 290.97 | 1.9 |
| MDB19 | Y0165 | 0123-6864 | 3.00 | 3.80 | 0.80 | 390.60 | 1.91 |

| Hole_ID | Sample_ID | Lab_Report | From | To | Width | Li_ppm | K_% |
|---|---|---|---|---|---|---|---|
| MDB19 | Y0166 | 0123-6864 | 3.80 | 5.00 | 1.20 | 387.69 | 2 |
| MDB19 | Y0167 | 0123-6864 | 5.00 | 6.00 | 1.00 | 417.82 | 1.73 |
| MDB19 | Y0168 | 0123-6864 | 6.00 | 7.00 | 1.00 | 374.10 | 1.67 |
| MDB19 | Y0169 | 0123-6864 | 7.00 | 8.00 | 1.00 | 393.37 | 1.91 |
| MDB19 | Y0170 | 0123-6864 | 8.00 | 9.00 | 1.00 | 418.06 | 1.91 |
| MDB19 | Y0171 | 0123-6864 | 9.00 | 10.00 | 1.00 | 399.16 | 1.84 |
| MDB19 | Y0172 | 0123-6864 | 10.00 | 11.00 | 1.00 | 382.43 | 1.65 |
| MDB19 | Y0173 | 0123-6864 | 11.00 | 12.00 | 1.00 | 359.96 | 1.55 |
| MDB19 | Y0174 | 0123-6864 | 12.00 | 13.00 | 1.00 | 275.51 | 1.52 |
| MDB19 | Y0186 | 0123-6864 | 14.00 | 15.00 | 1.00 | 263.64 | 1.96 |
| MDB19 | Y0187 | 0123-6864 | 15.00 | 16.20 | 1.20 | 216.39 | 1.78 |
| MDB21 | Y0163 | 0123-6864 | 0.00 | 1.20 | 1.20 | 206.98 | 2.23 |
| MDB22 | Y0175 | 0123-6864 | 13.00 | 14.00 | 1.00 | 247.50 | 1.67 |
| MDB22 | Y0176 | 0123-6864 | 0.00 | 2.00 | 2.00 | 191.78 | 2.08 |
| MDB22 | Y0177 | 0123-6864 | 2.00 | 3.00 | 1.00 | 91.30 | 2.46 |
| MDB22 | Y0178 | 0123-6864 | 3.00 | 3.80 | 0.80 | 105.82 | 2.33 |
| MDB23 | Y0179 | 0123-6864 | 0.00 | 1.80 | 1.80 | 293.08 | 1.96 |
| MDB23 | Y0181 | 0123-6864 | 1.80 | 2.40 | 0.60 | 317.93 | 1.84 |
| MDB23 | Y0182 | 0123-6864 | 2.40 | 3.00 | 0.60 | 376.51 | 1.95 |
| MDB23 | Y0183 | 0123-6864 | 4.00 | 5.00 | 1.00 | 395.05 | 1.98 |
| MDB23 | Y0184 | 0123-6864 | 5.00 | 6.00 | 1.00 | 388.40 | 1.93 |
| MDB23 | Y0185 | 0123-6864 | 6.00 | 7.00 | 1.00 | 335.57 | 1.81 |
| MDB24 | Y0188 | 0123-6864 | 0.00 | 0.80 | 0.80 | 224.44 | 2.06 |
| MDB24 | Y0189 | 0123-6864 | 0.80 | 2.00 | 1.20 | 110.27 | 2.05 |
| MDB24 | Y0190 | 0123-6864 | 2.00 | 3.20 | 1.20 | 86.95 | 1.98 |

**COMPETENT PERSONS STATEMENT & PREVIOUSLY REPORTED INFORMATION**

The information in this announcement that relates to Exploration Results is based on, and fairly represents, information and supporting documentation prepared by the Competent Person(s) whose name(s) appears below, each of whom is either an independent consultant to the Company and a member of a Recognised Professional Organisation or a director of the Company. The Competent Person(s) named below have sufficient experience relevant to the style of mineralisation and types of deposits under consideration and to the activity which he has undertaken to qualify as a Competent Person as defined in the JORC Code 2012.

The information in this announcement that relates to Mineral Resources complies with the 2012 Edition of the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves (JORC Code) and that has been compiled, assessed, and created under the supervision of Dr Johan Hattingh B.Sc. (Hons.), Ph.D., who is a member of the South African Council for Natural Scientific Professions (membership no. #400112/93) and is a director of Geological and GIS Consulting firm Creo Design (Pty) Ltd, which is a consultant to Arcadia and Bitterwasser Lithium Exploration (Pty) Ltd.

Dr Hattingh 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 Persons as defined in the 2012 Edition of the JORC Code. Dr Hattingh is the competent person for the estimation and has relied on provided information and data from the Company, including but not limited to the geological model, database and expertise gained from site visits. Dr Hattingh consents to the inclusion in this announcement of matters based on his information in the form and context in which it appears. The Mineral Resource is based on standard industry practises for drilling, logging, sampling, assay methods including quality assurance and quality control measures as detailed in the annexures.

| Competent Person | Membership | Report/Document |
|---|---|---|
| Mr Philip le Roux (Director Arcadia Minerals) | South African Council for Natural Scientific Professions #400125/09 | This announcement |
| Dr Johan Hattingh | B.Sc. (Hons) Ph.D South African Council of Natural Scientific Professions #400112/93 | Independent Geological Report on the Lithium Resource at the Madube Pan, Including JORC tables |

The Company confirms that the form and context in which a Competent Person's previous findings are presented in the footnotes above and noted in the table below have not been materially modified from the original market announcements and that all material assumptions and technical parameters underpinning the announcement continue to apply. 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.

| Release Date | ASX Announcements |
|---|---|
| 1. 22 November 2022 | *Lithium confirmed at Madube pan with 44% thicker clay unit.* |
| 2. 24 August 2022 | *Over 500% increase in Lithium Resource with 287Kt of LCE declared at Bitterwasser* |
| 3. 9 May 2022 | *Regional Study Advances Work Program for District Scale Lithium-in-Brines* |
| 4. 10 October 2022 | *Drilling Indicates Potential to Grow Lithium Resource* |
| 6. 9 November 2022<br>6 February 2023 | *Geophysical Anomaly at Lithium in Brines at Bitterwasser*<br>*Bitterwasser Geophysical Interpretation Define Drill Targets* |

| Release Date | ASX Announcements |
|---|---|
| 9. 6 February 2023 | *Bitterwasser Geophysical Interpretation Define Drill Targets* |

**MINERAL RESOURCES ESTIMATE**

The Company confirms that it is not aware of any new information or data that materially affects the information included in the Bitterwasser Mineral Resource estimate and all material assumptions and technical parameters underpinning the estimate continue to apply and have not materially changed when referring to its updated resource announcement made on 24 August 2022.

The information in this announcement that relates to Mineral Resources complies with the 2012 Edition of the Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves (JORC Code).

**Summary of estimated JORC compliant Mineral Resources for the Bitterwasser Project – Lithium in Clays (Eden Pan)**

| CATEGORY | UNIT | TONNAGE ton | GRADE Li ppm | CONTAINED Li ton |
|---|---|---|---|---|
| **Cut-off Grade of 0 ppm Li** | | | | |
| **Indicated** | Upper | - | - | - |
| | Middle | - | - | - |
| | Total Indicated | - | - | - |
| **Inferred** | Upper | 61 518 571 | 464.60 | 28 582 |
| | Middle | 92 382 945 | 568.85 | 52 552 |
| | Total Inferred | 153 901 516 | 527.18 | 81 134 |
| **Cut-off Grade of 500 ppm Li** | | | | |
| **Indicated** | Upper | - | - | - |
| | Middle | - | - | - |
| | Total Indicated | - | - | - |
| **Inferred** | Upper | 28 192 877 | 556.86 | 15 699 |
| | Middle | 56 955 751 | 670.72 | 38 201 |
| | Total Inferred | 85 148 628 | 633.03 | 53 900 |
| **Cut-off Grade of 600 ppm Li** | | | | |
| **Indicated** | Upper | - | - | - |
| | Middle | - | - | - |
| | Total Indicated | - | - | - |
| **Inferred** | Upper | 2 878 041 | 634.69 | 3 659 |
| | Middle | 21 292 230 | 729.82 | 28 282 |
| | Total Inferred | 44 516 575 | 717.50 | 31 941 |

**BACKGROUND ON ARCADIA**

Arcadia is a Namibia-focused diversified metals exploration company, which is domiciled in Guernsey. The Company explores for a suite of new-era metals (Lithium, Tantalum, Platinum-Group-Elements, Nickel and Copper). The Company's strategy is to bring the advanced Swanson Tantalum project into production and then to use the cashflows (which may be generated) to drive exploration and development at the potentially company transforming exploration assets. As such, the first two pillars of Arcadia's development strategy (a potential cash generator and company transforming exploration assets) are established through a third pillar, which consists of utilising the Company's human capital of industry specific experience, tied with a history of project generation and bringing projects to results, and thereby, to create value for the Company and its shareholders.

Most of the Company's projects are located in the neighbourhood of established mining operations and significant discoveries. The mineral exploration projects include-

1. Bitterwasser Lithium in Clay Project – which project contains a potentially expanding JORC Mineral Resource from lithium-in-clays
2. Bitterwasser Lithium in Brines Project – which is prospective for lithium-in-brines within the Bitterwasser Basin area.
3. Kum-Kum Project – prospective for nickel, copper, and platinum group elements.
4. TVC Pegmatite Project – prospective for Lithium, Tantalum and other associated minerals.
5. Karibib Project – prospective for copper and gold.
6. The Swanson Mining Project – advanced tantalum mining project undergoing development to become a mining operation, and which contains a potentially expanding JORC Mineral Resource within the Swanson Project area.

As an exploration company, all the projects of the company are currently receiving focus. However, currently the Swanson project and the Bitterwasser Lithium projects may be considered as Arcadia's primary projects due to their potential to enhance the Company's value.

For more details, please visit www.arcadiaminerals.global

**DISCLAIMER**

Some of the statements appearing in this announcement may be forward-looking statements. You should be aware that such statements are only predictions and are subject to inherent risks and uncertainties. Those risks and uncertainties include factors and risks specific to the industries in which Arcadia operates and proposes to operate as well as general economic conditions, prevailing exchange rates and interest rates and conditions in the financial markets, among other things. Actual events or results may differ materially from the events or results expressed or implied in any forward-looking statement. No forward-looking statement is a guarantee or representation as to future performance or any other future matters, which will be influenced by a number of factors and subject to various uncertainties and contingencies, many of which will be outside Arcadia's control.

The Company does not undertake any obligation to update publicly or release any revisions to these forward-looking statements to reflect events or circumstances after today's date or to reflect the occurrence of unanticipated events. No representation or warranty, express or implied, is made as to the fairness, accuracy, completeness or correctness of the information, opinions or conclusions contained in this announcement. To the maximum extent permitted by law, none of Arcadia, its directors, employees, advisors or agents, nor any other person, accepts any liability for any loss arising from the use of the information contained in this announcement. You are cautioned not to place undue reliance on any forward-looking statement. The forward-looking statements in this announcement reflect views held only as at the date of this announcement.

This announcement is not an offer, invitation, or recommendation to subscribe for, or purchase securities by the Company. Nor does this announcement constitute investment or financial product advice (nor tax, accounting, or legal advice) and is not intended to be used for the basis of making an investment decision. Investors should obtain their own advice before making any investment decision.

## APPENDIX 2 JORC 2012 Tables

The following Tables are provided to ensure compliance with the JORC Code (2012 Edition) requirements for the reporting of Exploration Results and Mineral Resources at the Bitterwasser Lithium-in-Clays Project (Madube Pan)

### Section 1 Sampling Techniques and Data

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| *Sampling techniques* | • *Nature and quality of sampling (eg 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.*<br>• *Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.*<br>• *Aspects of the determination of mineralisation that are Material to the Public Report.*<br>• *In cases where 'industry standard' work has been done this would be relatively simple (eg '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 cases more explanation may be required, such as where there is coarse gold that has inherent sampling probles. Unusual commodities or mineralisation types (eg submarine nodules) may warrant disclosure of detailed information.* | • Sampling was undertaken using industry standard practices and consist of hand-auger drilling by Bitterwasser Lithium Exploration (Pty) Ltd.<br>• Drilling and sampling took place from October to December 2022.<br>• All drill holes are vertical.<br>• A total of 195 samples were taken from the core of the drilling campaign, of these 181 where for chemical/metallurgical analysis and 14 for QAQC purposes.<br>• Samples ranged from 0.94 kg to 6.83 kg.<br>• To minimize sample contamination, the collected sediment samples were placed on a canvas cloth, while the clay-bit was cleaned with a wet cloth and water after every sample.<br>• All drill hole and sample locations are mapped in WGS84 UTM zone 33S.<br>• During 2010 sampling was undertaken using industry standard practices and consisted of surface sampling by Botha & Hattingh (2017).<br>• 24 soil samples were taken from pits of 1.5 m depth. Two (2), 500 ml groundwater samples were taken from taps attached to the wind pumps.<br>• Measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used are not known, because this information is not recorded in available documents. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| *Drilling techniques* | • *Drill type (eg core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (eg core diameter, triple or standard tube, depth of diamond tails, face-sampling bit or other type, whether core is oriented and if so, by what method, etc).* | • Twenty-three (23) vertical hand-auger drillholes were drilled perpendicular to the long axis of the Madube Pan.<br>• The holes were drilled on a 500 m x 500 m grid and have a total core length of 213.60 m.<br>• A 250 mm long auger clay-bit with a 90 mm outer diameter was used.<br>• The depth of the holes ranged from 1.20 m to 19.00 m. |
| *Drill sample recovery* | • *Method of recording and assessing core and chip sample recoveries and results assessed.*<br>• *Measures taken to maximise sample recovery and ensure representative nature of the samples.*<br>• *Whether a relationship exists between sample recovery and grade and whether sample bias may have occurred due to preferential loss/gain of fine/coarse material.* | • Core recovery was 100% due to the cohesive nature of the clay.<br>• Core loss was recorded as part of the operational procedures where the core loss was calculated from the difference between actual length of core recovered and penetration depth measured as the total length of the drill string after subtracting the stick-up length.<br>• Measures taken to maximise sample recovery and ensure representative nature of the samples is not recorded in available documents.<br>• No apparent bias was noted between sample recovery and grade. |
| *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.*<br>• *Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.*<br>• *The total length and percentage of the relevant intersections logged.* | • All drill holes were fully logged and are qualitative.<br>• The core has been logged to a level of detail to support appropriate Mineral Resource estimation, mining studies and metallurgical studies.<br>• The total length of the mineralized clay logged is 213.60 m and the percentage is 100%.<br>• The soil samples of Botha & Hattingh, (2017) have been logged according to industry standards. |
| *Sub-sampling techniques and* | • *If core, whether cut or sawn and whether quarter, half or all core taken.*<br>• *If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.*<br>• *For all sample types, the nature, quality and appropriateness of the sample* | • Each of the 181 samples was split into two. One split was for chemical analysis and the other split were stored.<br>• The Upper Unit was composite sampled at an interval of 2.6 to 3.0 m while the Middle Unit was sampled at an average interval of 1.00 m. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| *sample preparation* | *preparation technique.*<br>• *Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.*<br>• *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.*<br>• *Whether sample sizes are appropriate to the grain size of the material being sampled.* | • A composite sample were collected according to lithology units. Samples didn't cross over lithological boundaries. A representative sample were taken of each 20 cm run, taking in account the sample weight and size. i.e., one composite sample contain a weighted sample of each run.<br>• No information is available on sub-sampling techniques and sample preparation of Botha & Hattingh (2017), because such procedures are not documented in available documents. It is assumed that sampling was undertaken using industry standard practices. |
| *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.*<br>• *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.*<br>• *Nature of quality control procedures adopted (eg standards, blanks, duplicates, external laboratory checks) and whether acceptable levels of accuracy (ie lack of bias) and precision have been established.* | • The samples were analysed at Scientific Services laboratory, Cape Town South Africa.<br>• Sodium peroxide fusion ICP-OES with an ICP-MS finish for analysis of Li (ppm), K (%) and Mg (%) was done.<br>• The QAQC samples consisted of 7 African Minerals Standards (Pty) Ltd's (AMIS) certified reference materials of which AMIS0339 and (standard), AMIS0358 (standard),were used along with 7 blanks.<br>• The Botha & Hattingh (2017) samples were submitted to the University of Stellenbosch Central Analytical Facility in Stellenbosch South Africa for analysis, between 20 April and 13 July 2010<br>• The samples were analysed of lithium, boron and the cations Ca, Mg, K and Na.<br>• Lithium and boron analysis was conducted using ICP analysis, while the cations were analysed using AAS.<br>• Only samples which yielded Li values above 300 ppm were included in the cation analysis.<br>• Sample preparation for Li, B and cation analysis was by acid digestion. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | | • It is assumed that industry best practices were used by the laboratories to ensure sample representivity and acceptable Bitterwasser Lithium assay data accuracy, however the specific QAQC procedures used are not recorded in available documents |
| *Verification of sampling and assaying* | • *The verification of significant intersections by either independent or alternative company personnel.*<br>• *The use of twinned holes.*<br>• *Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.*<br>• *Discuss any adjustment to assay data.* | • All samples and data were verified by the project geologist.<br>• Creo reviewed all available sample and assay reports and is of the opinion that the electronic database supports the field data in almost all aspects and suggests that the database can be used for resource estimation.<br>• All sample material was bagged and tagged on site as per the specific drill hole it was located in. The sample intersections were logged in the field and were weighed at the sampling site.<br>• All hard copy data-capturing was completed at the sampling locality.<br>• All sample material was stored at a secure storage site.<br>• The original assay data has not been adjusted.<br>• Recording of field observations and that of samples collected was done in field notes and transferred to and electronic data base following the Standard Operational Procedures.<br>• No twin holes were drilled. |
| *Location of data points* | • *Accuracy and quality of surveys used to locate drill holes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.*<br>• *Specification of the grid system used.*<br>• *Quality and adequacy of topographic control.* | • The locations of all the samples were recorded.<br>• The sample locations are GPS captured using WGS84 UTM zone 33S.<br>• The quality and accuracy of the GPS and its measurements is not known, because it is not stated in available documents. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| *Data spacing and distribution* | • *Data spacing for reporting of Exploration Results.*<br>• *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.*<br>• *Whether sample compositing has been applied.* | • The drill holes are spaced on a 500 m x 500 m grid.<br>• The Upper Unit was composite sampled at an interval of 2.6 to 3.0 m while the Middle Unit was sampled at an average interval of 1.00 m<br>• The samples collected are a composite sample that represents each 20 cm run (sample tube length) as best as possible and do not extend over lithological boundaries. The composite sample contain between 33-50% of each 20 cm sample depending on the size. Composite samples contain as close to equal amount as possible from top to bottom of each lithological unit sampled.<br>• The data spacing and distribution of the drill holes and samples 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.<br>• For the Botha & Hattingh (2017) samples, the P02 pits were spaced at 900 m and the P03 pits were spaced at 2500 m. |
| *Orientation of data in relation to geological structure* | • *Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.*<br>• *If the relationship between the drilling orientation and the orientation of key mineralised structures is considered to have introduced a sampling bias, this should be assessed and reported if material.* | • The holes were all drilled vertical and perpendicular to the sediment horizons and all the sediment horizons were sampled equally and representative.<br>• The lithium is not visible; therefore, no bias could take place when selecting the sample position.<br>• The orientation of the Botha & Hattingh (2017) sample pits is vertical, and sampling occurred perpendicular to the soil horizons and all the soil horizons were sampled equally and representative.<br>• The orientation of the sampling is unbiased. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | | • The relationship between the sampling orientation and the orientation of key mineralized structures is not considered to have introduced a sampling bias. |
| *Sample security* | • *The measures taken to ensure sample security.* | • Bitterwasser Lithium Exploration (Pty) Ltd. maintained strict chain-of-custody procedures during all segments of sample handling, transport and samples prepared for transport to the laboratory are bagged and labelled in a manner which prevents tampering. Samples also remain in Bitterwasser Lithium Exploration (Pty) Ltd control until they are delivered and released to the laboratory.<br>• An export permit was obtained from the Namibian Mining Department to transport the samples across the border.<br>• Measures taken by Botha & Hattingh, (2017) to ensure sample security have not been recorded in available documents. |
| *Audits or reviews* | • *The results of any audits or reviews of sampling techniques and data.* | • Audits and reviews were limited to the Standard Operational Procedures in as far as data capturing was concerned during the sampling.<br>• Creo considers that given the general sampling programme, geological investigations and check assaying, the procedures reflect an appropriate level of confidence. |

**Section 2 Reporting of Exploration Results**

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

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| *Mineral tenement and 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.*<br>• *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.* | • The Bitterwasser Project area is east of Kalkrand in south central Namibia, some 190 km south of Windhoek in the Hardap Region.<br>• The Bitterwasser Lithium Project comprise of three exclusive exploration licences, EPLs 5353, 5354 and 5358, all held by Bitterwasser Lithium Exploration (Pty) Ltd.<br>• The project covers a total area of 59 323.09 hectares.<br>• Environmental Clearance Certificates was obtained by Bitterwasser Lithium for all three EPLs.<br>• A land-use agreement, including access to the property for exploration has been obtained through the Ministry of Agriculture, Water and Forestry of Namibia. |
| *Exploration done by other parties* | • *Acknowledgment and appraisal of exploration by other parties.* | • A regional reconnaissance investigation in the form of a systematic field survey covering the entire southern Namibia and some parts of the Northern Cape Province of South Africa was done during 2009 and 2010. The reconnaissance investigation was aimed at establishing the prospectiveness of the area that could potentially sustain economic exploitation of soda ash and lithium (Botha & Hattingh, 2017). |
| *Geology* | • *Deposit type, geological setting and style of mineralisation.* | • The Madube Pan forms part of the Cenozoic aged Kalahari Group and comprises a lithium, potassium and boron enriched sulphate-, chlorite- and carbonate- saltpan.<br>• Post-Cretaceous Brukkaros alkaline volcanics and sub-volcanics in the area |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | | and are potential source rocks for the lithium.<br>• The presence of an active deep-seated connate/hydrothermal water circulation network is suggested, which acts as a transport mechanism for lithium bearing brines into the overlying Gordonia Formation pan sediments.<br>• High evaporation rates (>3200 mm/year) occurring in the area are favourable for brine formation and salt-concentration. |
| *Drill hole Information* | • *A summary of all information material to the understanding of the exploration results including a tabulation of the following information for all Material drill holes:*<br>o *easting and northing of the drill hole collar*<br>o *elevation or RL (Reduced Level – elevation above sea level in metres) of the drill hole collar*<br>o *dip and azimuth of the hole*<br>o *down hole length and interception depth*<br>o *hole length.*<br>• *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.* | • Drill results have been described in section 7.2 of this report and Appendix 1 of the announcement.<br>• All relevant data is included in the report. |
| *Data aggregation methods* | • *In reporting Exploration Results, weighting averaging techniques, maximum and/or minimum grade truncations (eg cutting of high grades) and cut-off grades are usually Material and should be stated.*<br>• *Where aggregate intercepts incorporate short lengths of high-grade results and longer lengths of low-grade results, the procedure used for such* | • A lower cut-off grade of 500 ppm Li was used. The estimated volumes and grades are based on this cut-off grade. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | *aggregation should be stated and some typical examples of such aggregations should be shown in detail.*<br>• *The assumptions used for any reporting of metal equivalent values should be clearly stated.* | |
| *Relationship between mineralisation widths and intercept lengths* | • *These relationships are particularly important in the reporting of Exploration Results.*<br>• *If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.*<br>• *If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (eg 'down hole length, true width not known').* | • The drill holes were all drilled vertical, with the clay units being horizontal.<br>• The mineralized clay thickness intercepted range from 1.20 m to 19.00 m. |
| *Diagrams* | • *Appropriate maps and sections (with scales) and tabulations of intercepts should be included for any significant discovery being reported These should include, but not be limited to a plan view of drill hole collar locations and appropriate sectional views.* | • The appropriate diagrams and tabulations are supplied in the main report. |
| *Balanced 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.* | • This report has been prepared to present the prospectivity of the project and results of historical and recent exploration activities.<br>• All the available reconnaissance work results have been reported. |
| *Other substantive 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 deleterious or contaminating substances.* | • The Namibian Government conducted a regional magnetic survey in the area.<br>• The Namibian Government conducted a radiometric survey of potassium in the area. |
| *Further work* | • *The nature and scale of planned further work (eg tests for lateral extensions* | • The next exploration phase should focus on the further exploration of the |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | *or depth extensions or large-scale step-out drilling).*<br>• *Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.* | Madube Pan, while also conducting exploration on some of the other pans in the region.<br>• See section 13 for detailed recommended and planned further exploration activities. |

**Section 3 Estimation and Reporting of Mineral Resources**

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| *Database integrity* | • *Measures taken to ensure that data has not been corrupted by, for example, transcription or keying errors, between its initial collection and its use for Mineral Resource estimation purposes.*<br>• *Data validation procedures used.* | • Creo has independently verified the underlying sampling and assay data.<br>• Creo is of the opinion that the electronic database supports the field data in almost all aspects and suggests that the database can be used for resource estimation. |
| *Site visits* | • *Comment on any site visits undertaken by the Competent Person and the outcome of those visits.*<br>• *If no site visits have been undertaken indicate why this is the case.* | • Johan Hattingh the competent person conducted several site inspections visits since 2010 to the Bitterwasser area. During these visits, first hand field surveys were performed. |
| *Geological interpretation* | • *Confidence in (or conversely, the uncertainty of) the geological interpretation of the mineral deposit.*<br>• *Nature of the data used and of any assumptions made.*<br>• *The effect, if any, of alternative interpretations on Mineral Resource estimation.*<br>• *The use of geology in guiding and controlling Mineral Resource estimation.*<br>• *The factors affecting continuity both of grade and geology.* | • Creo considers that the quantity and quality of the sampling, sample preparation and handling is sufficient to declare the Mineral Resource to the level of confidence implied by the classification used in the report.<br>• The inclusive approach adopted in the declaration of mineral resources and mineral reserves is a consequence of the ability to predict even over long distances the extent and grade of the deposit due to the simple lithological composition and mineralisation style and the correct interpretations thereof. |
| *Dimensions* | • *The extent and variability of the Mineral Resource expressed as length* | • The resource has a total area of 512 ha. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | *(along strike or otherwise), plan width, and depth below surface to the upper and lower limits of the Mineral Resource.* | • The depth bellow surface of the upper limit of the is 0 m and the lower limit range from 1.20 m to 19.00 m. |
| *Estimation and modelling techniques* | • *The nature and appropriateness of the estimation technique(s) applied and key assumptions, including treatment of extreme grade values, domaining, interpolation parameters and maximum distance of extrapolation from data points. If a computer assisted estimation method was chosen include a description of computer software and parameters used.*<br>• *The availability of check estimates, previous estimates and/or mine production records and whether the Mineral Resource estimate takes appropriate account of such data.*<br>• *The assumptions made regarding recovery of by-products.*<br>• *Estimation of deleterious elements or other non-grade variable of economic significance (eg sulphur for acid mine drainage characterisation).*<br>• *In the case of block model interpolation, the block size in relation to the average sample spacing and the search employed.*<br>• *Any assumptions behind modelling of selective mining units.*<br>• *Any assumptions about correlation between variable.*<br>• *Description of how the geological interpretation was used to control the resource estimates.*<br>• *Discussion of basis for using or not using grade cutting or capping.*<br>• *The process of validation, the checking process used, the comparison of model data to drill hole data, and use of reconciliation data if available.* | • The drilling data was used to generate a block model of the drilled portion of the pan sediment from which volume estimations were done.<br>• The drillhole data was composited within Leapfrog Geo® (Version 2022.1.1) on a 213.6 m composite length.<br>• Grade estimation was undertaken using Ordinary Kriging and the estimation approach was considered appropriate based on review of a number of factors, including the quantity and spacing of available data, the interpreted controls on mineralization, and the style and geometry of mineralization.<br>• Indicator Kriging was chosen to delineate the areas with continuous grades and was used later as a start model to adequately define the mineralization.<br>• Based on grade information and geological logging and observations, Upper Unit, Middle Unit and Lower Units, mineralized domain boundaries have been interpreted and formulated into wireframes to permit the resource estimation.<br>• The interpretation and wireframe models were developed using Leapfrog Geo® geological modelling software package.<br>• A 50 m x 50 m x 10 m block size provided the best results for delineating the mineralized zones using the Indicator Kriging methodology and a 5 m x 5 m x variable block size provided the best results for geo-statistical estimation and hence the estimation was conducted on a 10 m x 10 m x 10 m (X, Y & Z respectively) block model size.<br>• The resource was estimated at a lower cut-off grade of 500 ppm Li. |
| *Moisture* | • *Whether the tonnages are estimated on a dry basis or with natural* | • Moisture was not considered during tonnage estimation. |

| Criteria | JORC Code explanation | Commentary |
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| | *moisture, and the method of determination of the moisture content.* | |
| *Cut-off parameters* | • *The basis of the adopted cut-off grade(s) or quality parameters applied.* | • A lower cut-off grade of 500 ppm Li has been applied during estimations. |
| *Mining factors or assumptions* | • *Assumptions made regarding possible mining methods, minimum mining dimensions and internal (or, if applicable, external) mining dilution. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider potential mining methods, but the assumptions made regarding mining methods and parameters when estimating Mineral Resources may not always be rigorous. Where this is the case, this should be reported with an explanation of the basis of the mining assumptions made.* | • No assumptions have been made. |
| *Metallurgical factors or assumptions* | • *The basis for assumptions or predictions regarding metallurgical amenability. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider potential metallurgical methods, but the assumptions regarding metallurgical treatment processes and parameters made when reporting Mineral Resources may not always be rigorous. Where this is the case, this should be reported with an explanation of the basis of the metallurgical assumptions made.* | • No assumptions have been made. |
| *Environmental factors or assumptions* | • *Assumptions made regarding possible waste and process residue disposal options. It is always necessary as part of the process of determining reasonable prospects for eventual economic extraction to consider the potential environmental impacts of the mining and processing operation. While at this stage the determination of potential environmental impacts, particularly for a greenfields project, may not always be well advanced, the* | • No assumptions have been made. |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | *status of early consideration of these potential environmental impacts should be reported. Where these aspects have not been considered this should be reported with an explanation of the environmental assumptions made.* | |
| *Bulk density* | • *Whether assumed or determined. If assumed, the basis for the assumptions. If determined, the method used, whether wet or dry, the frequency of the measurements, the nature, size and representativeness of the samples.*<br>• *The bulk density for bulk material must have been measured by methods that adequately account for void spaces (vugs, porosity, etc), moisture and differences between rock and alteration zones within the deposit.*<br>• *Discuss assumptions for bulk density estimates used in the evaluation process of the different materials.* | • Bulk density determinations have been undertaken over all the lithologies and oxidation states except the Lower Unit (LT) on the neighbouring Eden Pan during two phases.<br>• The densities determined during phase 2 were used in the Madube Pan resource estimate.<br>• The phase 2 density measurements of the Middle Unit range between 1.673 – 1.929 g/cm$^3$, with an average of 1.820 g/cm$^3$, and the density of Upper Unit ranges between 1.850 – 2.321 g/cm$^3$, with an average of 2.003 g/cm$^3$. These clay density measurements were considered accurate and truly representative of the Eden Pan clays.<br>• The density values determined during the Phase II measurements were used by Bitterwasser Lithium in subsequent resource estimation work. |
| *Classification* | • *The basis for the classification of the Mineral Resources into varying confidence categories.*<br>• *Whether appropriate account has been taken of all relevant factors (ie relative confidence in tonnage/grade estimations, reliability of input data, confidence in continuity of geology and metal values, quality, quantity and distribution of the data).*<br>• *Whether the result appropriately reflects the Competent Person's view of the deposit.* | • The Bitterwasser Lithium Exploration (Pty) Ltd exploration area in the Madube Pan is classified as an Inferred Mineral Resource.<br>• Where blocks bounded by sampling on at least one side, or where the down dip continuation of a block has been demonstrated by auger-hole intersections. Inferred Resource blocks are limited to the drilled area where more data sets are available and are normally the blocks with the highest density of samples. Here geological interpretation suggests that continued mineralisation is likely even where no drilling information is available. These blocks are open ended in depth. Wide spaced auger sample data is available |

| Criteria | JORC Code explanation | Commentary |
|---|---|---|
| | | as the only data source.<br>• The results reflect the Competent Person's view of the deposit. |
| *Audits or reviews* | • *The results of any audits or reviews of Mineral Resource estimates.* | • Creo has independently verified the underlying sampling and assay data as well as the resource modelling and where possible also the resource calculations. Creo considers that given the general sampling programme, geological investigations, independent check assaying and, in certain instances, independent audits, the estimates reflect an appropriate level of confidence. |
| *Discussion of relative accuracy/ confidence* | • *Where appropriate a statement of the relative accuracy and confidence level in the Mineral Resource estimate using an approach or procedure deemed appropriate by the Competent Person. For example, the application of statistical or geostatistical procedures to quantify the relative accuracy of the resource within stated confidence limits, or, if such an approach is not deemed appropriate, a qualitative discussion of the factors that could affect the relative accuracy and confidence of the estimate.*<br>• *The statement should specify whether it relates to global or local estimates, and, if local, state the relevant tonnages, which should be relevant to technical and economic evaluation. Documentation should include assumptions made and the procedures used.*<br>• *These statements of relative accuracy and confidence of the estimate should be compared with production data, where available.* | • Creo considers that the quantity and quality of the sampling, sample preparation and handling is sufficient to declare the Mineral Resource to the level of confidence implied by the classification used in the audited Mineral Resource estimate given in this report. |