



## High-grade rock chips up to 54.9% Mn confirms further manganese prospectivity

### HIGHLIGHTS

- Mapping and rock chip results:
  - Black Hill Northeast prospect include: **54.9% Mn, 50.3% Mn, 49.5% Mn, 53.3% Mn**
  - Gold Trip prospect include: **47.5% Mn, 45.7% Mn, 38.2% Mn, 35.5% Mn**
  - Epona prospect include: **41.5% Mn, 38.1% Mn, 36.3% Mn, 33.3% Mn,**
  - Black Beauty North prospect include: **42.4% Mn, 40.0% Mn, 39.2% Mn, 35.7% Mn**
- RC drilling to commence at all four prospects and additional drilling at Brumby Creek after Program of Works and Heritage approvals.

Bryah Resources Limited (ASX: BYH, “Bryah” or “the Company”) is pleased to announce manganese rock chip and drilling results at its 49% owned Bryah Basin manganese project. The results are part of the program drilled in July 2022 in addition to mapping and associated rock chips in new areas. Bryah (49%) and OM (Manganese) Ltd (OMM) (51%) have a Joint Venture (JV) to undertake exploration to test targets in the area, with a view to commencing manganese production. OMM is a wholly owned subsidiary of OM Holdings Limited (ASX: OMH), one of the world’s leading suppliers of manganese ores.

Commenting on the drilling, Bryah CEO Ashley Jones said: *“The more we look in this area, the more prospects we discover that need to be drilled. These new prospects are high priority drill targets this year. Between newly identified GAIP anomalies and prospects identified from mapping, we have many new targets to test. Our drilling strategy is focussed on increasing the current JORC resource and reaching a critical mass to restart operations.”*

The Bryah Basin project area is located approximately 100km north of the town of Meekatharra in Western Australia. The Company’s tenements and manganese mineral rights cover 1,135km<sup>2</sup> over parts of the western Bryah Basin. Figure 1 shows the Manganese Joint Venture tenement package, with prospects and an existing manganese Mineral Resource.<sup>1</sup>

Mapping and rock chip results were taken over 4 new areas, Black Hill Northeast, Gold Trip, Epona and Black Beauty North.

<sup>1</sup>See ASX announcement dated 3rd March 2022 ‘Maiden Bryah Basin Manganese Mineral Resource’.



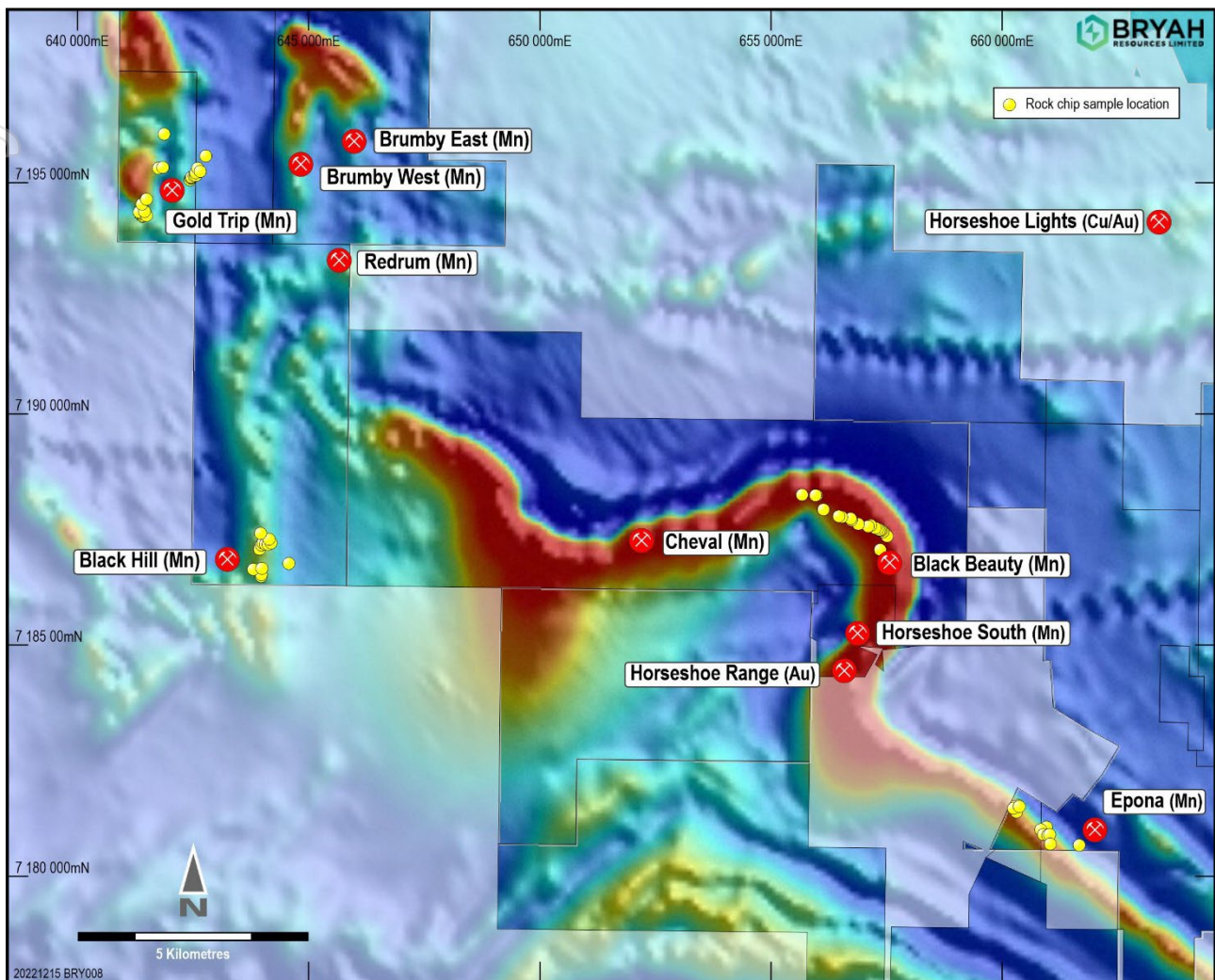


Figure 1: Rock chip locations with magnetic background showing the Horseshoe Formation

### **Black Hill Northeast**

Northeast of the Black Hill resource area, outcropping Mn was outlined and sampled. The area was identified by the Gradient Array Induced Polarisation (GAIP) surveys and both chargeable and conductive, which are the key criteria that Bryah and OMM are assessing for Mn mineralisation. Assaying of the rock chips showed excellent supergene enrichment of the Mn, returning grades high in Mn with low Fe.



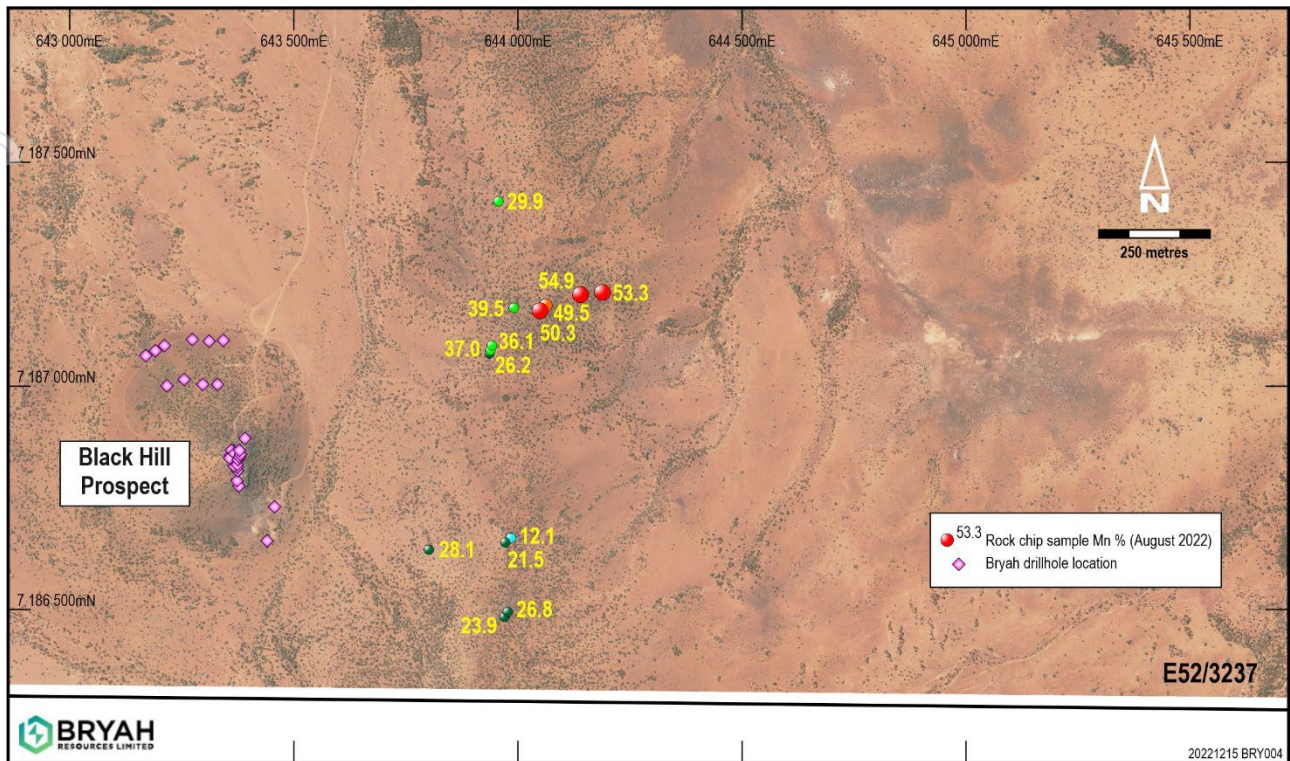


Figure 2: Black Hill NE prospect Rock Chip results

### Gold Trip

The Gold Trip prospect occurs on a newly added tenement to the joint venture, acquired by Bryah late in 2021. The outcropping manganese appears to dip under cover to the east and provides an excellent downslope target.

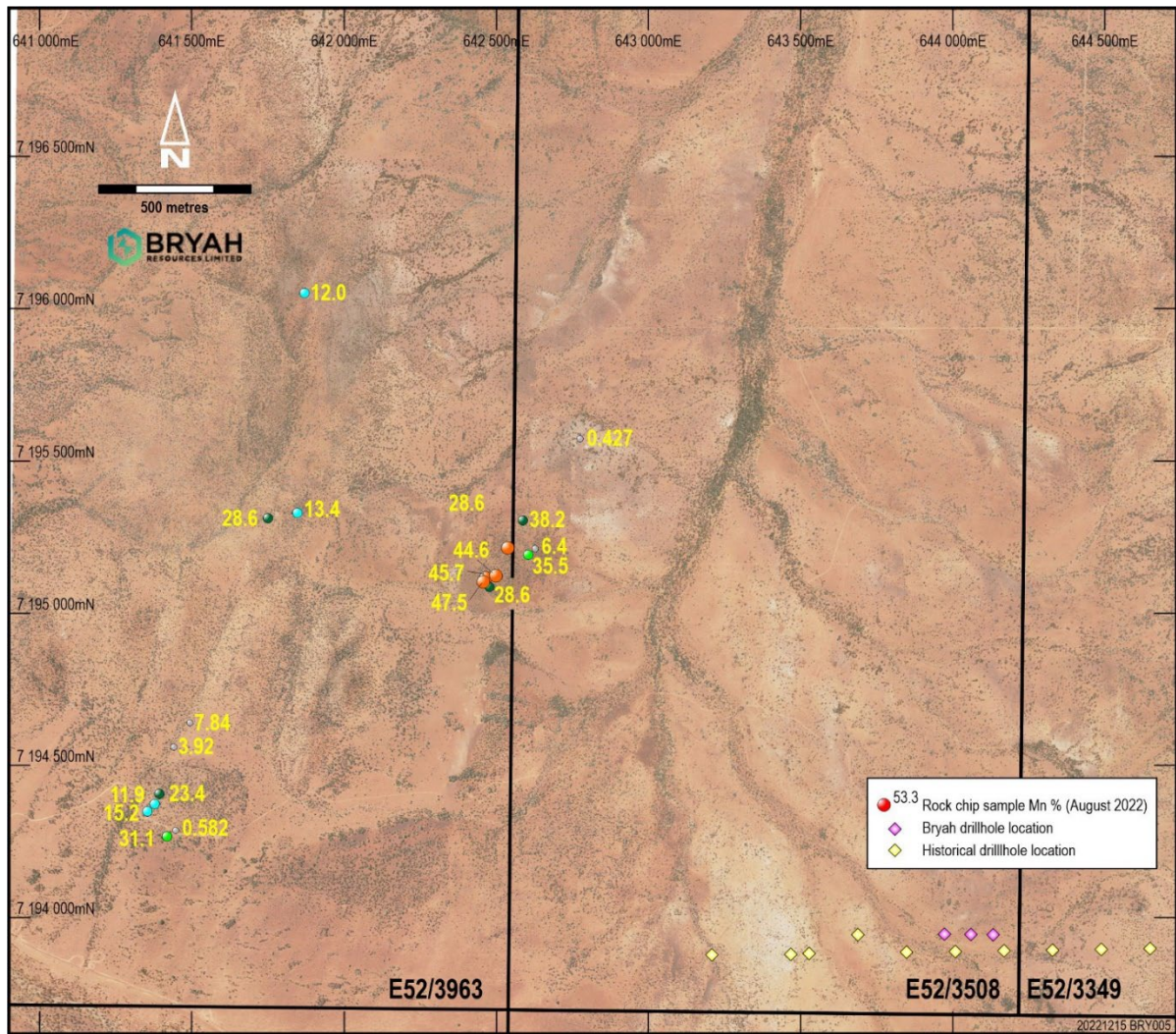


Figure 3: Gold Trip Rock chip results





### **Black Beauty North**

More than 1km of strike of the Horseshoe range was followed and sampled where outcropping. Further drilling is planned over this area.

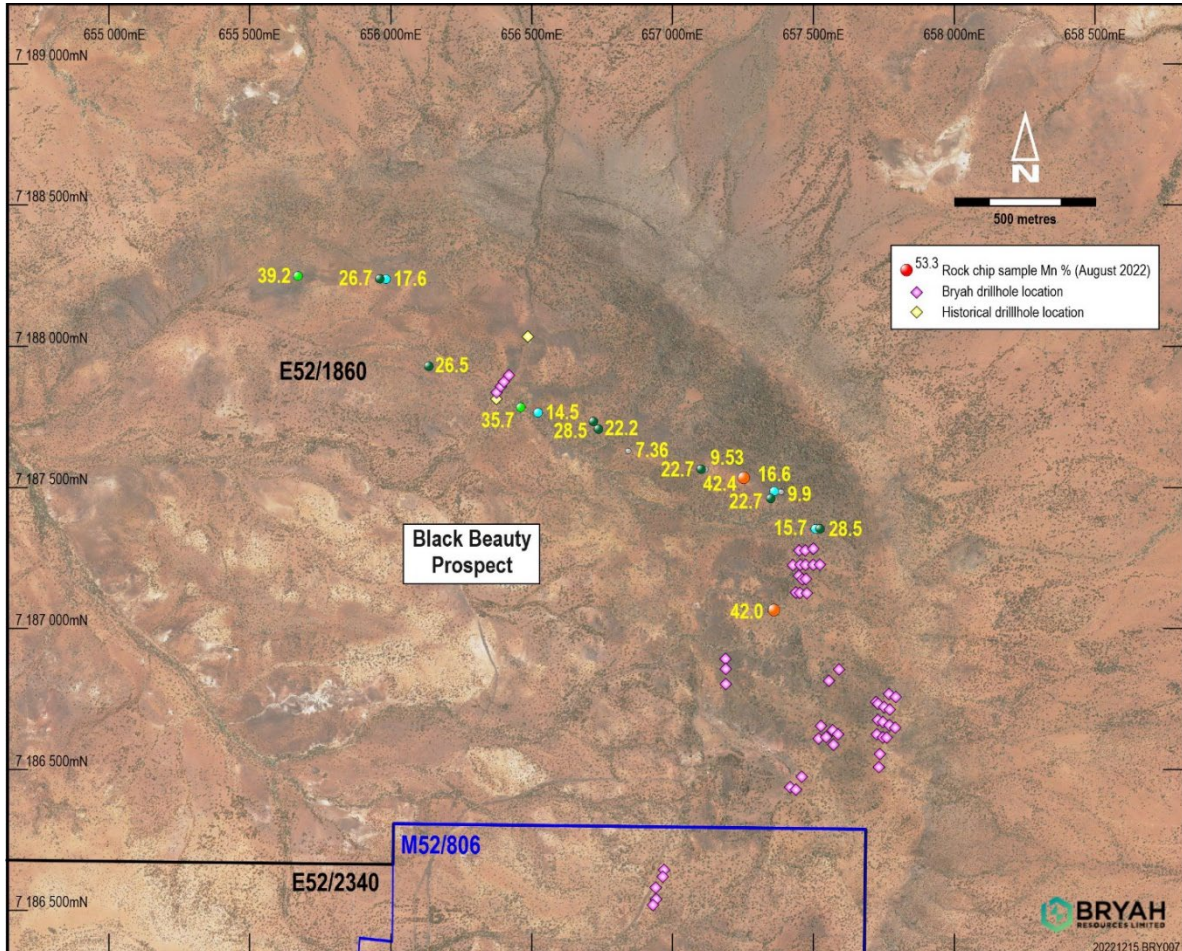


Figure 4: Black Beauty North Rock Chip results





### The Epona Prospect

Outcropping Mn and abundant manganese in scree are evident in this area on both E52/3236 and on the newly granted E52/4096 tenements.

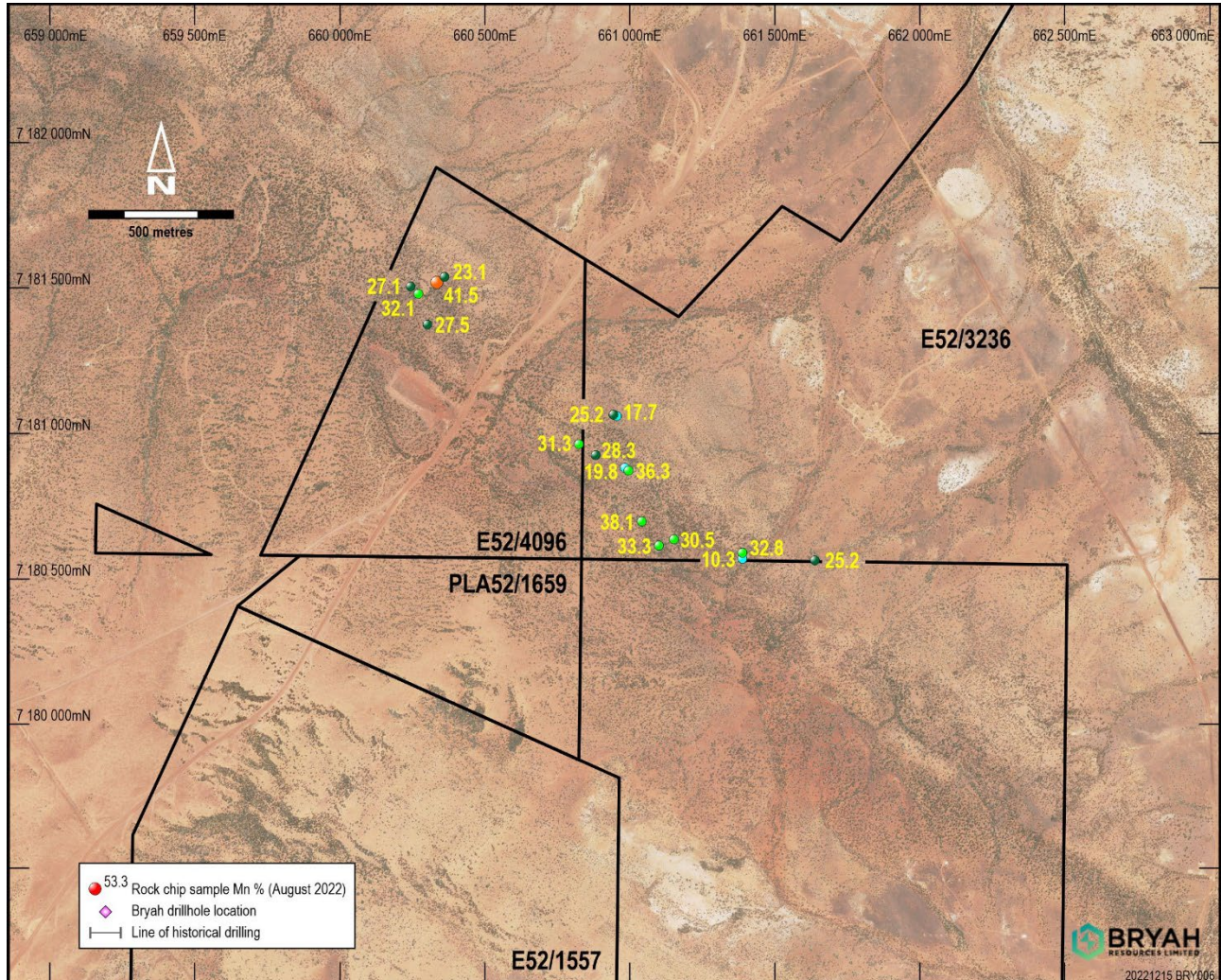


Figure 5: The Epona Prospect Rock Chip results

### Drilling

Drilling during July 2022 was targeted on GAIP surveys. The drilling targets were constrained by the current heritage clearances. Figure 6 shows the location of the drilling and prospects, with existing Bryah manganese drill collars. The drilling tested GAIP anomalies that had the potential for channel type manganese.



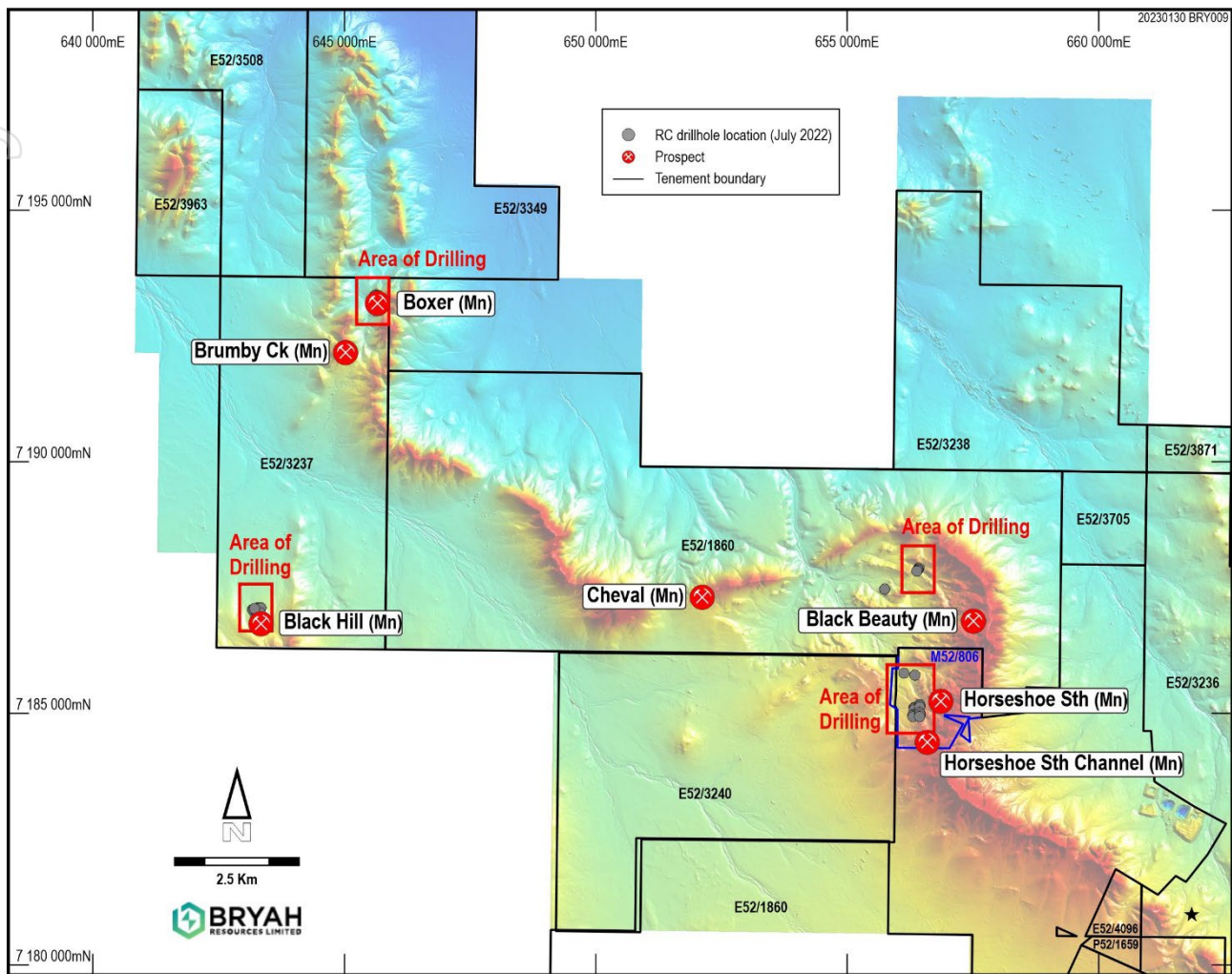


Figure 6: Collar Plan of July 2022 Manganese Drilling

### Significant intersections

Significant intersections were returned from this drilling, which reflects the channel targets that were investigated. The channel targets were all within proximity to known Mn outcrop and represented remobilised Mn. The GAIP did identify manganese, but it identifies both the higher and lower tenors of mineralisation with the technique. A full table of results >10% Mn is supplied in Appendix 2.

Hole ID	From	To	Mn_pct	Fe_pct	SiO2_pct
BXRC002	4	5	17.6	23.8	13.7
BNRC003	1	6	16.3	25.6	16.7
BNRC003	10	11	15.4	29.6	14.9
BNRC003	21	24	15.3	30.2	11.3
BNRC003	33	34	15.8	30.4	11.2
BNRC003	45	46	16.1	16.2	36.2
BHRC026	7	9	16.0	2.1	61.7

Table 1: Significant intersections (>15 % Mn)

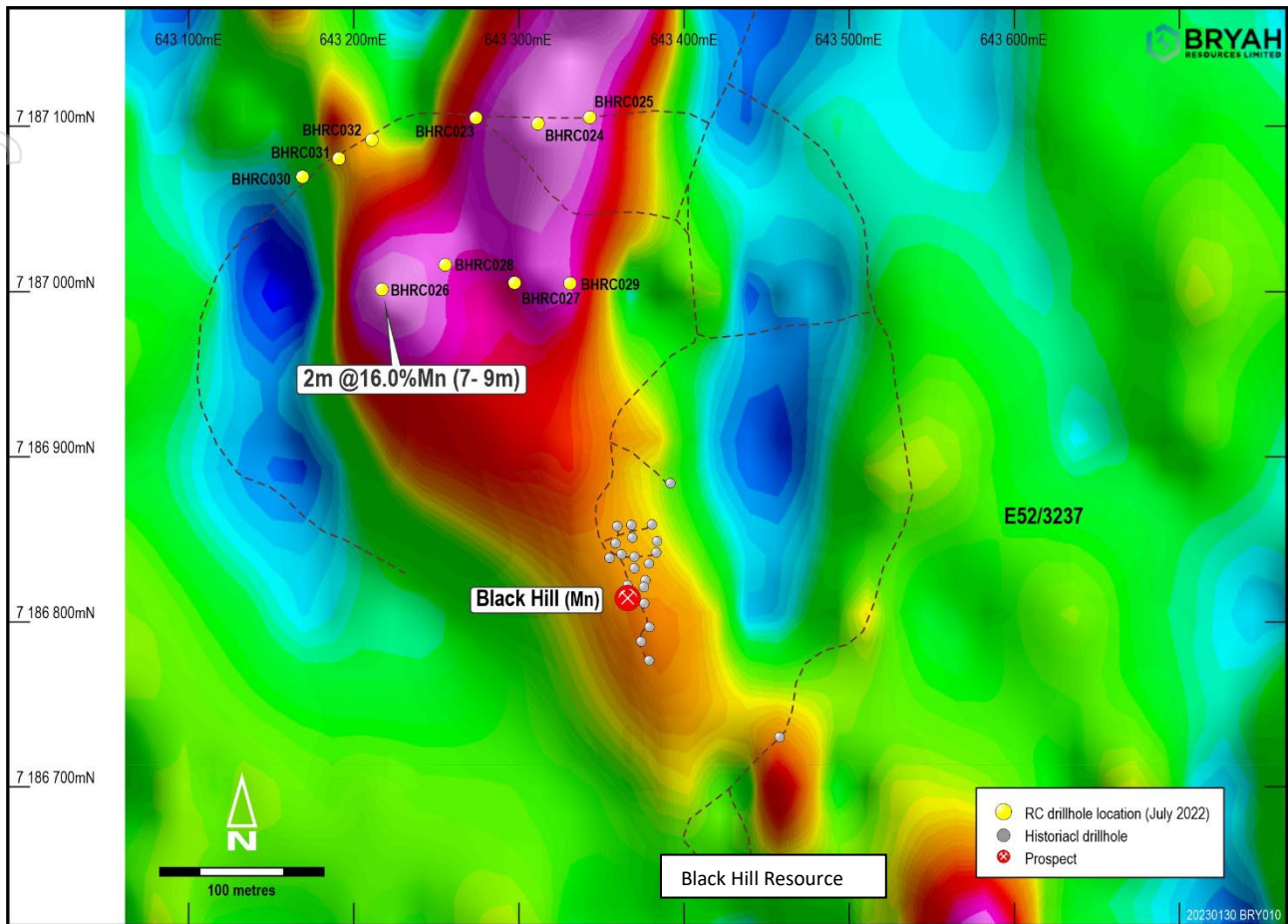


Figure 7: GAIP chargeability contours and drilling at Black Hill channel targets



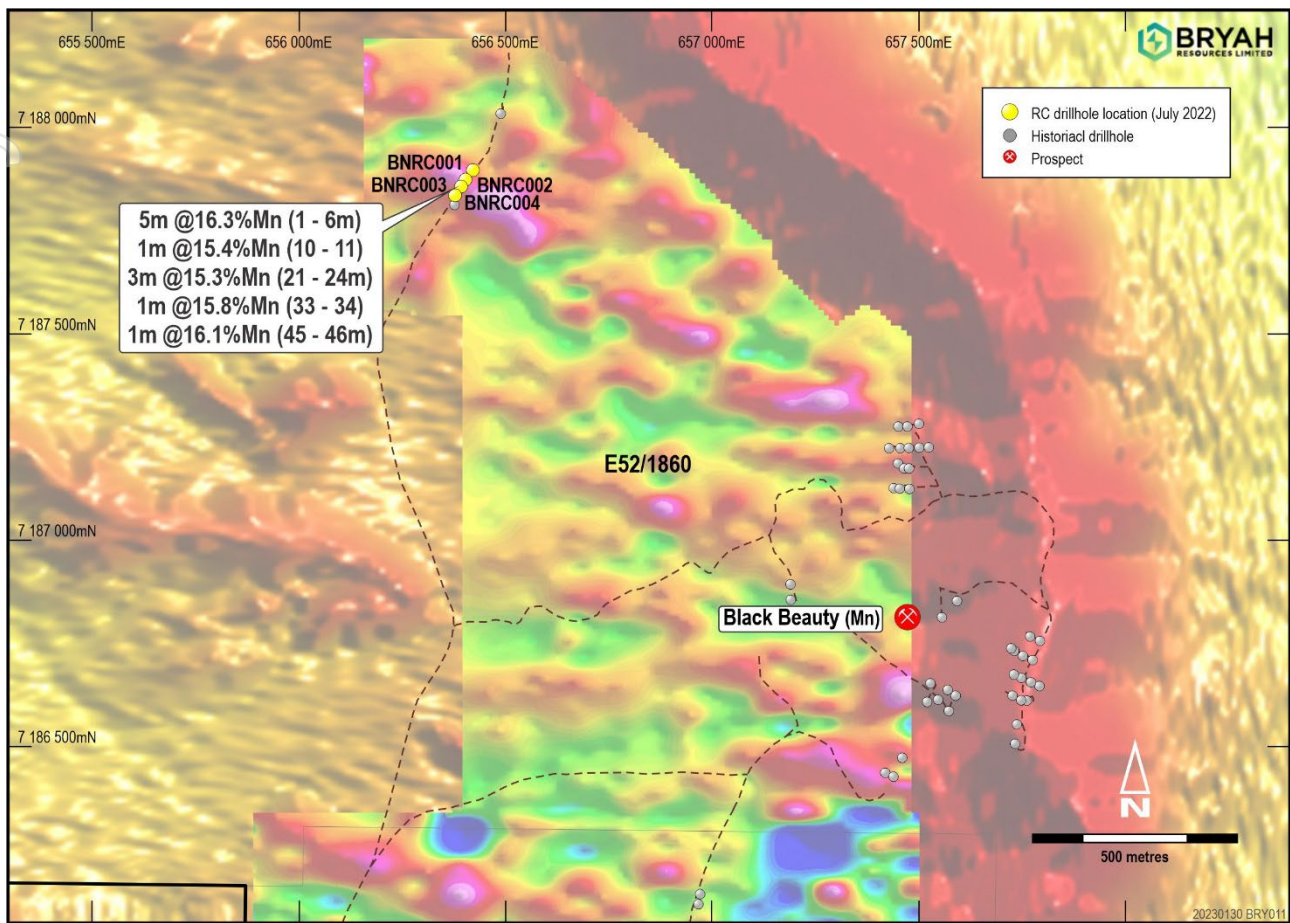


Figure 8: Black Beauty North Intersects >15% Mn on GAIP chargeability targets

## FUTURE WORK

Results of drilling completed in December 2022<sup>2</sup> at Brumby West and Redrum is still pending. Further drilling at the 4 new prospects, as well as additional drilling at Brumby Creek, is being planned.

*For further information, please contact:*

**Ashley Jones, CEO** +61 8 9321 0001

*This announcement has been produced in accordance with the Company's published continuous disclosure policy and has been approved by the Board.*

<sup>2</sup> ASX announcement 22 December 2022



## ABOUT BRYAH RESOURCES

Bryah's assets are all located in Western Australia, a Tier One global mining and exploration jurisdiction. Strategically the Projects are energy metals focused, or able to exploit synergies of geological knowledge, locality and exploration.

The prospective Bryah Basin licences cover 1,048km<sup>2</sup> and have a potential new Volcanogenic Massive Sulphide (VMS) 'Horseshoe Lights type' mine analogue at the Windalah prospect, and multiple other similar untested targets. The area also contains extensive outcroppings of manganese, the subject of a substantial \$7M joint venture with ASX listed OM Holdings Limited (ASX: OMH). OMH is a vertically integrated manganese producer and refiner with a market capitalisation of over \$600m. Bryah and OMH have an excellent working relationship, with OMH having already spent over \$3 million to earn-in to the Manganese Rights of the Project.

Gabanintha, near Meekatharra, has a JORC 2012 Mineral Resource for Cu, Ni, Co<sup>3</sup> and additional structural gold potential. The copper nickel resource and recently identified gold mineralisation at Gabanintha will be the subject of further drill definition and a prefeasibility study to integrate the project with the Australian Vanadium Project (ASX: AVL). The resource has been defined by the drilling efforts of AVL in the development of its vanadium project and enabled Bryah to define a base metal resources inventory.

Bryah's base metals inventory at Gabanintha and manganese JV in the Bryah Basin have a clear pathway to production, which will be significantly advanced in 2022 by the commencement and completion of metallurgical feasibility studies at both projects.

An option agreement has been signed over the Lake Johnston tenements which are prospective for battery metals lithium and nickel. On IPO the option holder Mining Green Metals Ltd will pay 5 million shares for 51% of the project, with another 5 million shares for the remaining 49%. The corridor near Lake Johnston contains significant mines and discoveries of nickel and lithium, including the Mount Holland Lithium Mine and the historical Maggie Hays/Emily Ann nickel deposits.

Bryah holds 20.75% of gold focused Star Minerals (ASX:SMS). Star has a Mineral Resource at Tumblegum South and exploration prospects in the West Bryah Basin.

---

<sup>3</sup> See ASX announcement dated 25th May 2022 '*36.0 MT Ni-Cu-Co Mineral Resource at Gabanintha*'.





## Forward Looking Statements

*This report may contain certain “forward-looking statements” which may not have been based solely on historical facts, but rather may be based on the Company’s current expectations about future events and results. Where the Company expresses or implies an expectation or belief as to future events or results, such expectation or belief is expressed in good faith and believed to have a reasonable basis. However, forward looking statements are subject to risks, uncertainties, assumptions and other factors which could cause actual results to differ materially from future results expressed, projected or implied by such forward-looking statements. Readers should not place undue reliance on forward looking information. The Company does not undertake any obligation to release publicly any revisions to any “forward looking statement” to reflect events or circumstances after the date of this report, or to reflect the occurrence of unanticipated events, except as may be required under applicable securities laws.*

## COMPETENT PERSON STATEMENT – EXPLORATION RESULTS AND EXPLORATION TARGETS

The information in this announcement that relates to Exploration Results is based on information compiled by Mr Tony Standish, who is a Member of the Australian Institute of Geoscientists. Mr Standish is a consultant to Bryah Resources Limited (“the Company”). Tony Standish has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking 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’. Tony Standish consents to the inclusion in this announcement of the matters based on his information in the form and context in which it appears.

Where the Company refers to Exploration Results in this announcement (referencing previous releases made to the ASX), the Company is not aware of any new information or data that materially affects the information included in the relevant market announcements.

## COMPETENT PERSON STATEMENT — MINERAL RESOURCE ESTIMATION

The information in this announcement that relates to Mineral Resources is based on and fairly represents information compiled by Mr Lauritz Barnes, (Consultant with Trepanier Pty Ltd), Dr Joe Drake-Brockman (Consultant with Drake-Brockman Geoinfo Pty Ltd) and Ms Gemma Lee (Principal Geologist with Bryah Resources). Mr Barnes, Dr Drake-Brockman and Ms Lee are members of the Australasian Institute of Mining and Metallurgy (AusIMM) and/or the Australian Institute of Geoscientists (AIG). All have sufficient experience of relevance to the styles of mineralisation and types of deposits under consideration, and to the activities undertaken to qualify as Competent Persons as defined in the 2012 Edition of the Joint Ore Reserves Committee (JORC) Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves. Specifically, Mr Barnes is the Competent Person for the estimation, Dr Drake-Brockman is the Competent Person for the geological model and site visits and Ms Lee is the Competent Person for the geological database. Mr Barnes, Dr Drake-Brockman and Ms Lee consent to the inclusion in this announcement of the matters based on their information in the form and context in which they appear.

The Company confirms that it is not aware of any new information or data that materially affects the information included in announcements referred to and all material assumptions and technical parameters underpinning the Mineral Resource estimates within those announcements continue to apply and have not materially changed. The Company confirms that the form and context in which the Competent Persons findings are presented have not materially changed from the original announcement.



## Appendix 1

### Rock Chip Locations

Table 2: Rick chip locations and results.

North	East	Lease ID	Fe %	Mn %	SiO <sub>2</sub> %
7180560	661638	E52_3236	13.9	23.1	32.7
7180871	660994	E52_3236	18.3	<b>36.3</b>	2.6
7180879	660980	E52_3236	37.6	19.8	2.6
7180611	661098	E52_3236	8.6	<b>33.3</b>	9.9
7181057	660954	E52_3236	46.0	17.7	0.9
7181062	660942	E52_3236	29.4	<b>25.2</b>	2.5
7180961	660823	E52_4096	18.5	<b>31.3</b>	6.6
7187562	657101	E52_1860	25.1	22.7	2.7
7187564	657115	E52_1860	43.6	9.5	1.6
7187626	656843	E52_1860	37.4	7.4	1.4
7187763	656523	E52_1860	34.3	14.5	8.8
7187781	656460	E52_1860	11.5	<b>35.7</b>	12.4
7187700	656737	E52_1860	23.7	22.2	1.1
7187482	657385	E52_1860	48.4	9.9	0.5
7187458	657348	E52_1860	33.9	22.7	1.8
7187484	657361	E52_1860	25.7	16.6	10.5
7187351	657507	E52_1860	35.5	15.7	6.4
7194266	641416	E52_3963	22.4	<b>31.1</b>	2.7
7194373	641376	E52_3963	38.4	11.9	7.5
7194406	641392	E52_3963	23.3	23.4	9.6
7194560	641438	E52_3963	15.7	3.9	66.6
7194639	641489	E52_3963	24.3	7.8	40.8
7194348	641352	E52_3963	29.3	15.2	14.4
7195324	641845	E52_3963	27.4	13.4	22.4
7195311	641748	E52_3963	14.6	<b>28.6</b>	16.1
7195086	642476	E52_3963	18.1	<b>26.8</b>	10.1
7195573	642774	E52_3508	29.1	0.4	42.8
7196051	641868	E52_3963	13.4	12.0	50.9
7194286	641445	E52_3963	6.5	0.6	85.0
7186634	643801	E52_3237	14.5	<b>28.1</b>	24.4
7186654	643976	E52_3237	20.3	21.5	24.3
7186650	643971	E52_3237	41.2	12.1	4.3
7186495	643976	E52_3237	12.3	<b>26.8</b>	29.9
7186485	643969	E52_3237	28.0	23.9	7.9
7187091	643941	E52_3237	11.5	<b>36.1</b>	7.4
7187072	643935	E52_3237	22.5	<b>26.2</b>	8.0
7187081	643939	E52_3237	15.7	<b>37.0</b>	4.1
7187174	643990	E52_3237	11.9	<b>39.5</b>	4.9
7187167	644048	E52_3237	6.5	<b>50.3</b>	1.5
7187179	644061	E52_3237	8.6	<b>49.5</b>	0.9
7187204	644139	E52_3237	3.0	<b>54.9</b>	0.7
7187412	643956	E52_3237	14.4	<b>29.9</b>	14.9
7187208	644188	E52_3237	3.3	<b>53.3</b>	1.1
7187927	656135	E52_1860	13.5	<b>26.5</b>	20.0
7188236	655982	E52_1860	44.0	17.6	1.3
7188247	655670	E52_1860	5.6	<b>39.2</b>	8.8
7181503	660243	E52_4096	20.9	<b>27.1</b>	6.4
7180567	661387	E52_3236	20.1	10.3	39.9
7180582	661386	E52_3236	4.0	<b>32.8</b>	20.9
7180633	661150	E52_3236	23.0	<b>30.5</b>	4.5
7180695	661039	E52_3236	13.3	<b>38.1</b>	5.3





North	East	Lease ID	Fe %	Mn %	SiO <sub>2</sub> %
7180923	660881	E52_3236	25.8	<b>28.3</b>	1.8
7181531	660355	E52_4096	37.1	23.1	1.1
7194300	641393	E52_3963	7.5	50.5	0.8
7195115	642464	E52_3963	8.6	45.7	1.5
7195106	642471	E52_3963	6.5	47.5	2.3
7195122	642497	E52_3963	12.1	44.6	2.9
7195213	642536	E52_3963	12.2	43.4	1.6
7195197	642608	E52_3508	20.5	35.5	3.5
7195304	642586	E52_3508	5.1	38.2	10.0
7195203	642618	E52_3508	48.6	6.4	3.9
7181517	660333	E52_4096	11.8	41.5	1.0
7181478	660269	E52_4096	12.3	32.1	6.7
7187731	656720	E52_1860	24.9	28.5	1.0
7187531	657253	E52_1860	8.7	42.4	3.9
7187343	657518	E52_1860	28.2	28.5	6.6
7187063	657360	E52_1860	5.9	42.0	5.6
7188237	655961	E52_1860	33.5	26.7	0.9
7181372	660300	E52_4096	23.2	27.5	2.8

Grid is MGA94\_50

## Appendix 2

Table 3: Drill locations

Hole_ID	Hole_Type	Max_Depth	East	North	RL	Prospect	Collar_Dip
BHRC023	RC	40	643272	7187103	536	Black Hill Flats	-90
BHRC024	RC	40	643310	7187100	537	Black Hill Flats	-90
BHRC025	RC	40	643342	7187101	536	Black Hill Flats	-90
BHRC026	RC	36	643216	7187000	538	Black Hill Flats	-90
BHRC027	RC	36	643296	7187003	541	Black Hill Flats	-90
BHRC028	RC	36	643254	7187014	539	Black Hill Flats	-90
BHRC029	RC	36	643329	7187003	542	Black Hill Flats	-90
BHRC030	RC	36	643169	7187067	536	Black Hill Flats	-90
BHRC031	RC	36	643190	7187078	536	Black Hill Flats	-90
BHRC032	RC	48	643210	7187090	536	Black Hill Flats	-90
BNRC001	RC	36	656419	7187895	554	Black Beauty	-90
BNRC002	RC	36	656402	7187872	552	Black Beauty	-90
BNRC003	RC	60	656391	7187855	551	Black Beauty	-90
BNRC004	RC	63	656376	7187834	551	Black Beauty	-90
BXRC001	RC	36	645677	7193309	532	Boxer	-90
BXRC002	RC	36	645625	7193318	535	Boxer	-90
BXRC003	RC	36	645601	7193308	532	Boxer	-90
BXRC004	RC	36	645593	7193268	529	Boxer	-90
BXRC005	RC	36	645596	7193240	532	Boxer	-90



Hole_ID	Hole_Type	Max_Depth	East	North	RL	Prospect	Collar_Dip
BXRC006	RC	36	645637	7193199	537	Boxer	-90
BXRC007	RC	36	645633	7193011	533	Boxer	-90
BXRC008	RC	36	645608	7193024	530	Boxer	-90
HSRC111	RC	36	656397	7184967	566	HSS	-90
HSRC112	RC	36	656388	7184924	568	HSS	-90
HSRC113	RC	36	656389	7185007	563	HSS	-90
HSRC114	RC	48	656250	7184915	558	HSS	-90
HSRC115	RC	39	656257	7184941	559	HSS	-90
HSRC116	RC	36	656265	7184966	559	HSS	-90
HSRC117	RC	36	656275	7185055	558	HS Plant Channel	-90
HSRC118	RC	36	656281	7185086	557	HS Plant Channel	-90
HSRC119	RC	36	656278	7185111	557	HS Plant Channel	-90
HSRC120	RC	36	656390	7185168	559	HS Plant Channel	-90
HSRC121	RC	36	656393	7185143	559	HS Plant Channel	-90
HSRC122	RC	36	656391	7185116	560	HS Plant Channel	-90
HSRC123	RC	36	656290	7185737	552	Ball	-90
HSRC124	RC	36	656293	7185765	552	Ball	-90
HSRC125	RC	36	656072	7185740	547	Bat	-90
HSRC126	RC	36	656072	7185802	548	Bat	-90

Grid is MGA94\_50

Table 4: intersections >10%Mn

Hole_ID	Depth_From	Depth_To	Mn_pct	Fe_pct	SiO2_pct	Comments
BHRC023						No Significant Intersection
BHRC024						No Significant Intersection
BHRC025						No Significant Intersection
BHRC026	3	5	10.4	12.4	27.4	
BHRC026	7	9	16.0	2.1	61.7	
BHRC027						No Significant Intersection
BHRC028						No Significant Intersection
BHRC029						No Significant Intersection
BHRC030						No Significant Intersection
BHRC031						No Significant Intersection
BHRC032						No Significant Intersection
BNRC001						No Significant Intersection
BNRC002	22	23	12.3	29.9	13.4	
BNRC003	1	6	16.3	25.6	16.7	
BNRC003	10	11	15.4	29.6	14.9	
BNRC003	21	24	15.3	30.2	11.3	
BNRC003	33	34	15.8	30.4	11.2	
BNRC003	38	40	11.3	31.7	14.1	
BNRC003	42	43	14.3	13.8	41.5	
BNRC003	45	46	16.1	16.2	36.2	
BNRC003	48	49	13.5	20.8	29.9	





Hole_ID	Depth_From	Depth_To	Mn_pct	Fe_pct	SiO2_pct	Comments
BNRC004						No Significant Intersection
BXRC001						No Significant Intersection
BXRC002	2	5	12.6	25.9	16.2	
BXRC002	18	19	11.1	18.8	27.7	
BXRC003						No Significant Intersection
BXRC004						No Significant Intersection
BXRC005	15	16	10.6	26.9	17.5	
BXRC005	23	24	11.3	27.6	15.6	
BXRC006						No Significant Intersection
BXRC007						No Significant Intersection
BXRC008						No Significant Intersection
HSRC111						No Significant Intersection
HSRC112						No Significant Intersection
HSRC113						No Significant Intersection
HSRC114						No Significant Intersection
HSRC115						No Significant Intersection
HSRC116						No Significant Intersection
HSRC117						No Significant Intersection
HSRC118	7	8	12.2	17.2	27.0	
HSRC119	6	7	14.9	16.5	24.4	
HSRC120	2	3	11.8	20.9	24.1	
HSRC121	5	7	13.6	21.4	21.5	
HSRC122						No Significant Intersection
HSRC123						No Significant Intersection
HSRC124						No Significant Intersection
HSRC125						No Significant Intersection
HSRC126						No Significant Intersection

### Appendix 3

Table 5: 2012 JORC Manganese Mineral Resources at 15% Mn Cut-off<sup>1</sup>

Prospect	Category	Kt*	Mn %	Fe %
<b>Area 74</b>	Indicated	239	23.6	21.4
<b>Brumby Creek East and Brumby Creek West</b>		525	21.2	19.1
<b>Horseshoe South and Horseshoe South Extended</b>		295	20.5	23.6
<b>Black Hill</b>		24	29.7	20.2
<b>Total Indicated</b>		<b>1,083</b>	<b>21.7</b>	<b>20.9</b>
<b>Brumby Creek East and Brumby Creek West</b>	Inferred	403	20.3	21.8
<b>Horseshoe South and Horseshoe South Extended</b>		351	19.5	29.9
<b>Total Inferred</b>		<b>753</b>	<b>19.9</b>	<b>25.6</b>
<b>Total Mineral Resource</b>		<b>1,836</b>	<b>21.0</b>	<b>22.8</b>

\* Totals may not add up due to rounding. Kt = 1,000 Tonnes

<sup>1</sup> See ASX announcement dated 3rd March 2022 'Maiden Bryah Basin Manganese Mineral Resource



## Appendix 4 - Manganese RC Drilling

### JORC Code, 2012 Edition – Table 1 Exploration Results

#### Section 1 Sampling Techniques and Data

Criteria	JORC Code explanation	Commentary
<b>Sampling techniques</b>	<ul style="list-style-type: none"> <li>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.</li> <li>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used.</li> <li>Aspects of the determination of mineralisation that are Material to the Public Report.</li> <li>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 cases, more explanation may be 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.</li> </ul>	<ul style="list-style-type: none"> <li>Rock chip sampling was undertaken of selected outcrop on a visual basis to confirm geological interpretation. A 2-3kg sample was collected at each site and as such may have bias towards mineralisation.</li> <li>For this drilling program Bryah Resources Limited (Bryah Resources) utilised vertical Reverse Circulation (RC) drill holes.</li> <li>RC drilling was to accepted industry standard producing 1m samples of approximately 3kg weight which were collected beneath a rotary cone splitter mounted under the cyclone.</li> <li>The splitter reject sample was collected into green plastic bags which were numbered and laid into 10m rows, left in place at the hole until assays were returned and results validated.</li> <li>The holes were sampled as 1m samples from the splitter and placed into pre-numbered calico bags with the draw-string tied up and then placed inside the green plastic bag for later collection and despatch.</li> <li>The full length of each hole drilled was sampled, but only selected samples (based on visual logging) were collected and submitted to a contract commercial laboratory for sorting, drying, crushing, splitting, and pulverising.</li> <li>A prepared sample is then fused in a lithium borate flux with lithium nitrate additive. The resultant glass bead is analysed via X-Ray Fluorescence (XRF). XRF is suitable analysis for a wide range of geological ores.</li> </ul>
<b>Drilling techniques</b>	<ul style="list-style-type: none"> <li>Drill type (e.g. core, reverse circulation, open-hole hammer, rotary air blast, auger, Bangka, sonic, etc) and details (e.g. 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).</li> </ul>	<ul style="list-style-type: none"> <li>Bryah Resources' RC holes were drilled with a contract slimline RC drilling rig.</li> </ul>
<b>Drill sample recovery</b>	<ul style="list-style-type: none"> <li>Method of recording and assessing core and chip sample recoveries and results assessed.</li> <li>Measures taken to maximise sample recovery and ensure representative nature of the samples.</li> <li>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.</li> </ul>	<ul style="list-style-type: none"> <li>The RC samples were not weighed or measured for recovery on the rig but will be completed on a campaign basis later as required. A visual estimate of recovery was made in 3 categories (Poor/Fair/Good).</li> <li>To ensure maximum sample recovery and the representivity of the samples, an experienced Company geologist was present during drilling to monitor the sampling process. Any issues were immediately rectified.</li> </ul>





Criteria	JORC Code explanation	Commentary
		<ul style="list-style-type: none"> <li>Bryah Resources is satisfied that the RC holes have taken a sufficiently representative sample of the interval and minimal loss of fines has occurred in the RC drilling resulting in minimal sample bias.</li> <li>No twin RC drill holes have been completed to assess sample bias.</li> <li>At this stage, no investigations have been made into whether there is a relationship between sample recovery and grade.</li> </ul>
<b>Logging</b>	<ul style="list-style-type: none"> <li><i>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.</i></li> <li><i>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</i></li> <li><i>The total length and percentage of the relevant intersections logged.</i></li> </ul>	<ul style="list-style-type: none"> <li>All the 1m RC samples were sieved and collected into 20m chip trays for geological logging of colour, weathering, lithology, alteration and mineralisation for potential Mineral Resource estimation and mining studies.</li> <li>RC logging is both qualitative and quantitative in nature.</li> <li>The total length of the RC holes was logged. Where no sample was returned due to cavities/voids it was recorded as such.</li> <li>Rockchip samples were described geologically, along with location data with a hand held GPS during a mapping program that was following up Geophysical (GAIP) survey data.</li> </ul>
<b>Sub-sampling techniques and sample preparation</b>	<ul style="list-style-type: none"> <li><i>If core, whether cut or sawn and whether quarter, half or all core taken.</i></li> <li><i>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</i></li> <li><i>For all sample types, the nature, quality, and appropriateness of the sample preparation technique.</i></li> <li><i>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</i></li> <li><i>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.</i></li> <li><i>Whether sample sizes are appropriate to the grain size of the material being sampled.</i></li> </ul>	<ul style="list-style-type: none"> <li>Sampling technique: <ul style="list-style-type: none"> <li>All RC samples were collected by the RC rig into a cyclone and then passed through the cone splitter.</li> <li>The samples were generally dry, and all attempts were made to ensure the collected samples were dry. Moisture was logged in a qualitative way.</li> <li>The cyclone and cone splitter were cleaned with compressed air at the end of every 6m RC drill rod.</li> <li>The sample sizes were appropriate to correctly represent the mineralisation based on the style of mineralisation, the thickness and consistency of intersections, the sampling methodology and percent value assay ranges for the primary elements.</li> </ul> </li> <li>Quality Control Procedures were: <ul style="list-style-type: none"> <li>A duplicate sample was collected at regular intervals on the cyclone nominally 1 per 20 samples.</li> <li>Certified Reference Material (CRM) samples were inserted in the field every 50 samples containing a range of manganese values.</li> <li>Blank samples are inserted at the start of each hole.</li> <li>Overall QAQC insertion rate of 1:15 samples</li> <li>Laboratory repeats taken and standards inserted at pre-determined level specified by the laboratory.</li> <li>Sample preparation at the laboratory: The samples are weighed and dried at 105°C, then coarsely crushed to -6.3mm using a jaw crusher. If the sample size is greater than 2.5kg the</li> </ul> </li> </ul>



Criteria	JORC Code explanation	Commentary
		<p>samples are then riffle split. Samples are then pulverised by LM5 or disc pulveriser to 80% passing -75 microns.</p> <ul style="list-style-type: none"> <li>○ The sample sizes are considered appropriate to correctly represent the mineralisation based on the style of mineralisation, the thickness and consistency of intersections, the sampling methodology and the assay value ranges expected for manganese and its impurities.</li> </ul>
<b>Quality of assay data and laboratory tests</b>	<ul style="list-style-type: none"> <li>• <i>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</i></li> <li>• <i>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.</i></li> <li>• <i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>• XRF is suitable for the total analysis of a range of geological ores and is appropriate for analysis of manganese and its associated impurities.</li> <li>• Duplicates, blanks, and Certified Reference Material standards were included in the analyses.</li> </ul>
<b>Verification of sampling and assaying</b>	<ul style="list-style-type: none"> <li>• <i>The verification of significant intersections by either independent or alternative company personnel.</i></li> <li>• <i>The use of twinned holes.</i></li> <li>• <i>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</i></li> <li>• <i>Discuss any adjustment to assay data.</i></li> </ul>	<ul style="list-style-type: none"> <li>• Significant intersections have been independently verified by alternative company personnel.</li> <li>• The use of twinned holes has not been implemented and is not considered necessary at this stage of exploration.</li> <li>• The Competent Person has visited the site and supervised the drilling and sampling processes in the field.</li> <li>• All primary data related to logging and sampling are captured using laptops into point of capture validation LogChief templates.</li> <li>• All data is sent to Perth and stored in the centralised SQL Server database with a Data Shed front end which is managed by professional database consultants.</li> <li>• No adjustments or calibrations have been made to any assay data, apart from resetting below detection values to half positive detection.</li> </ul>
<b>Location of data points</b>	<ul style="list-style-type: none"> <li>• <i>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.</i></li> <li>• <i>Specification of the grid system used.</i></li> <li>• <i>Quality and adequacy of topographic control.</i></li> </ul>	<ul style="list-style-type: none"> <li>• All collars have currently been surveyed with a handheld GPS by Bryah staff and will be independently surveyed by surveyors using a differential GPS for accurate collar location and RL. The digital data has been loaded directly to the company SQL Server database.</li> <li>• No downhole surveys have been completed as all holes are shallow and nominally vertical.</li> <li>• The grid system for the Bryah Basin prospect is MGA_GDA94 Zone 50.</li> <li>• Topographic control is from a digital elevation model derived from aerial geophysical surveys.</li> </ul>





Criteria	JORC Code explanation	Commentary
<b>Data spacing and distribution</b>	<ul style="list-style-type: none"> <li>• <i>Data spacing for reporting of Exploration Results.</i></li> <li>• <i>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.</i></li> <li>• <i>Whether sample compositing has been applied.</i></li> </ul>	<ul style="list-style-type: none"> <li>• As this program tested several locations there was considerable variation in the drill spacing and drillhole orientation.</li> <li>• The drill spacing in this program is to provide sufficient information to establish the degree of geological and grade continuity applied under the 2012 JORC code for a mineral resource. Sample compositing was not applied to this drilling; all sampling was at 1m intervals.</li> </ul>
<b>Orientation of data in relation to geological structure</b>	<ul style="list-style-type: none"> <li>• <i>Whether the orientation of sampling achieves unbiased sampling of possible structures and the extent to which this is known, considering the deposit type.</i></li> <li>• <i>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.</i></li> </ul>	<ul style="list-style-type: none"> <li>• The attitude of the lithological units varies greatly both within the prospects and between prospect to prospect.</li> <li>• The sedimentary package the Horseshoe Range broadly runs northwest/southeast but due to folding can dip at a range of attitudes and directions. Manganese mineralisation can follow and/or overprint sedimentary bedding.</li> <li>• No drilling orientation and sampling bias has been recognised at this time and it is not considered to have introduced a sampling bias.</li> </ul>
	<ul style="list-style-type: none"> <li>• <i>The measures taken to ensure sample security.</i></li> </ul>	<ul style="list-style-type: none"> <li>• The calico samples collected were placed in polyweave sacks, and then packaged in bulka bags by company staff, before being transported to the relevant Perth laboratory by commercial freight.</li> <li>• Sample security is not considered a significant risk.</li> </ul>
<b>Audits or reviews</b>	<ul style="list-style-type: none"> <li>• <i>The results of any audits or reviews of sampling techniques and data.</i></li> </ul>	<ul style="list-style-type: none"> <li>• The Company database has been compiled from primary data by independent database consultants and was based on original assay data and historical database compilations.</li> <li>• A regular review of the data and sampling techniques is carried out internally.</li> </ul>



## Section 2 Reporting of Exploration Results

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

Criteria	JORC Code explanation	Commentary
<b>Mineral tenement and land tenure status</b>	<ul style="list-style-type: none"> <li>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.</li> <li>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.</li> </ul>	<ul style="list-style-type: none"> <li>The relevant tenements drilled in this program are E52/3237, E52/1860 and M52/806. M52/806 and E52/3237 is 100% owned by Bryah Resources Limited, while E52/1860 Bryah hold the mineral rights to Manganese only. OM (Manganese) Limited holds a 51% joint venture interest in respect to the manganese rights only on these tenements.</li> <li>Rockchip sampling on E52/3236, E52/3237, E52/3508, E52/3963 and E52/4096 is 100% owned by Bryah Resources Limited, while E52/1860 Bryah hold the mineral rights to Manganese only. OM (Manganese) Limited holds a 51% joint venture interest in respect to the manganese rights only on these tenements.</li> <li>At the time of reporting, there are no known impediments to obtaining a licence to operate in the area and the tenements are in good standing.</li> </ul>
<b>Exploration done by other parties</b>	<ul style="list-style-type: none"> <li>Acknowledgment and appraisal of exploration by other parties.</li> </ul>	<ul style="list-style-type: none"> <li>The manganese deposits in the region were discovered during the gold rush period between 1897 and 1911 however were of little interest to explorers at the time.</li> <li>Mining operations between 1948 and 1967 received the focus of early exploration.</li> <li>Manganese exploration conducted by BHP Limited, King Mining Corporation Ltd, Valiant Consolidated Ltd, and various others since the 1960's was concentrated mainly around the historic pits at Elsa Group, Millidie, Horseshoe South, Mudderwearie and Ravelstone.</li> <li>Tuart Resources Limited and Peak Hill Manganese Pty Ltd undertook regional exploration over a sizeable portion of the Bryah and Padbury Basins in the period after 2000, identifying numerous manganese anomalies from satellite imagery and aerial photography. Only limited on-ground exploration of these anomalies was undertaken.</li> </ul>
<b>Geology</b>	<ul style="list-style-type: none"> <li>Deposit type, geological setting, and style of mineralisation.</li> </ul>	<ul style="list-style-type: none"> <li>These manganese occurrences are within the Lower Proterozoic Bryah and Padbury Basins. Manganese deposits are a product of prolonged weathering and oxidation of sedimentary rocks and chemical concentration and re-deposition of manganese within ancient drainage systems. Most of the manganese deposits are remnants of former drainage paleochannels' or paleo water table concretions of manganese oxide. Although detailed</li> </ul>





Criteria	JORC Code explanation	Commentary
		surveys have not been completed, the location of most manganese deposits is at about the elevation of the former palaeosurface. These deposits are now left as hilltop mesas or capping (inverted relief).
<b>Drill hole Information</b>	<ul style="list-style-type: none"> <li>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: <ul style="list-style-type: none"> <li>easting and northing of the drill hole collar</li> <li>elevation or RL (Reduced Level – elevation above sea level in m) of the drill hole collar</li> <li>dip and azimuth of the hole</li> <li>down hole length and interception depth</li> <li>hole length.</li> </ul> </li> <li>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.</li> </ul>	<ul style="list-style-type: none"> <li>Refer to Table 4 of this announcement.</li> </ul>
<b>Data aggregation methods</b>	<ul style="list-style-type: none"> <li>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.</li> <li>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.</li> <li>The assumptions used for any reporting of metal equivalent values should be clearly stated.</li> </ul>	<ul style="list-style-type: none"> <li>No high-grade cuts have been applied to the reporting of exploration results.</li> <li>No metal equivalent values have been used.</li> </ul>
<b>Relationship between mineralisation widths and intercept lengths</b>	<ul style="list-style-type: none"> <li>These relationships are particularly important in the reporting of Exploration Results.</li> <li>If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported.</li> <li>If it is not known and only the down hole lengths are reported, there should be a clear statement to this effect (e.g. 'down hole length, true width not known').</li> </ul>	<ul style="list-style-type: none"> <li>In this program there was some variation in the drill spacing and hole orientation.</li> <li>Due to locally varying intersection angles between drill holes and lithological units all results are defined as downhole widths.</li> </ul>
<b>Diagrams</b>	<ul style="list-style-type: none"> <li>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.</li> </ul>	<ul style="list-style-type: none"> <li>See attached figures within this announcement.</li> </ul>
<b>Balanced reporting</b>	<ul style="list-style-type: none"> <li>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.</li> </ul>	<ul style="list-style-type: none"> <li>Refer to Appendix 2 of this announcement.</li> </ul>
<b>Other substantive exploration data</b>	<ul style="list-style-type: none"> <li>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.</li> </ul>	<ul style="list-style-type: none"> <li>No other exploration data available.</li> </ul>



Criteria	JORC Code explanation	Commentary
<b>Further work</b>	<ul style="list-style-type: none"><li>• <i>The nature and scale of planned further work (e.g. tests for lateral extensions or depth extensions or large-scale step-out drilling).</i></li><li>• <i>Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive.</i></li></ul>	<ul style="list-style-type: none"><li>• Additional planning and drilling to test for lateral extensions of manganese mineralisation is ongoing.</li></ul>