

30 October 2020

# September 2020 Quarterly Activities Report

#### Lucknow Gold Project, NSW

- Maiden diamond drilling program completed targeting the interpreted high-grade lode offset position of the historical Lucknow Gold Mine.
- The first hole LUDD0001, completed to a depth of 621.5m, intersected stringer/sulphide mineralisation in carbonate-rich zones, interpreted to represent the more distal extensions of the targeted main gold lodes<sup>1</sup>. Significant intersections include:

LUDD0001: 0.81m @ 2.34 g/t Au from 467.1m Including: 0.14m @ 4.10 g/t Au from 467.1m 0.45m @ 1.34 g/t Au from 491.5m

- The second hole, LUDD0002, was completed to a depth of 471.4m, with the lower portion of the hole intersecting quartz veining in the targeted Darcy Lode position to the west of, and below, the historical workings<sup>2</sup>.
- Assays returned low-grade gold mineralisation with the mineralised zones interpreted to represent the more distal extensions of the Darcy Lode<sup>2</sup>.
- LUDD0002 also intersected a zone of quartz veining and strong foliation, which is interpreted to represent the flat-lying fault that has offset the main lode controlling stratigraphy, as well as an ultramafic unit and the andesite contact.
- The recent drilling, supported by a structural and geological interpretation, suggests that the ultramafic stratigraphy and prospective contact has been offset to the north-west by a sinistral fault indicating a potential target to the north-west of recent drilling.

#### Lachlan Copper-Gold Project, NSW

TALISMAN

MINING LIMITED

• Planning was progressed for a new program of exploration to test prospective gold and copper targets at the Cumbine gold and Blind Calf copper prospects, with a program of geophysics and RC drilling commencing across three key areas in October.

#### **Corporate**

- Experienced mining executive Shaun Vokes appointed interim Chief Executive Officer.
- Review of multiple potential precious and base metal growth opportunities ongoing.
- Cash on hand at 30 September 2020 of \$11.1 million.

<sup>&</sup>lt;sup>1</sup> Refer Talisman ASX announcement dated 24 July 2020 for full details including JORC tables.

<sup>&</sup>lt;sup>2</sup> Refer Talisman ASX announcement dated 27 August 2020 for full details including JORC tables.



### <u>COVID-19</u>

During the September 2020 quarter, the Company returned to standard working hours and arrangements for all staff, with the provision of flexible working arrangements when required.

Measures remain in place across the corporate office and exploration sites to protect the safety and well-being of all employees and contractors. The Company continues to monitor the global pandemic with respect to any potential impact on its current work activities.

### Lucknow Gold Project, NSW

During the September 2020 quarter, Talisman completed its maiden two-hole diamond drilling program at the high-grade Lucknow Gold Project in NSW with all assays received.

The program was designed to test the interpreted fault offset position of the historical gold lodes at Lucknow (where historical production exceeded 400,000oz at an estimated average mined grade of +100g/t gold<sup>3</sup>) and represented the first drilling program by any explorer into this target area.

Geological interpretations based on historical drilling by previous explorers and mine records show an easterly-dipping contact between an ultramafic unit and an andesitic volcanic. Mine records indicate that the bonanza grade gold mineralisation occurs within east-west trending lodes as steeply plunging shoots at or near the andesite-ultramafic footwall contact.

Moving to the west away from the contact results in a gradual decrease in gold grades and vein mineralogy, with historical mine plans showing that stoping extended out approximately 150m from the contact in some areas.

The gold lodes and the ultramafic contact at Lucknow are interpreted to have been truncated and offset by a sub-horizontal fault at a depth of approximately 240m below surface. A three-dimensional model of the geology was constructed by Talisman to help define drill targets and support the position of the interpreted horizontal fault.

The first diamond drill hole (LUDD0001) was completed to a final depth of 621.5m. It intersected a highly fractured zone which is interpreted to represent the flat-lying fault that has offset the main lode controlling stratigraphy, but did not intersect the targeted ultramafic contact due to what appears to be a second cross-cutting fault.

The lower portion of the hole intersected stringer/sulphide mineralisation in carbonate-rich zones at depth in the targeted position, to the west of and below the historical workings. These zones are interpreted to represent the more distal extensions of the main gold lodes, with significant intersections received to date including<sup>4</sup>:

LUDD0001: 0.81m @ 2.34 g/t Au from 467.1m Inc: 0.14m @ 4.10 g/t Au from 467.1m 0.45m @ 1.34 g/t Au from 491.5m

The second diamond hole (LUDD0002), which was designed to test the area to the west of historical stoping in the Darcy Shaft, was completed at an end-of-hole depth of 471.4m<sup>5</sup>.

<sup>&</sup>lt;sup>3</sup> NSW DIGS report, First Annual Exploration Report EL5770, 2001 - R00030162.

<sup>&</sup>lt;sup>4</sup> Refer Talisman ASX announcement dated 24 July 2020 for full details including JORC tables.

<sup>&</sup>lt;sup>5</sup> Refer Talisman ASX announcement dated 27 August 2020 for full details including JORC tables.

MINING LIMITED



The hole intersected a zone of strong foliation and quartz veining from 297m to 303m down-hole, which is interpreted to represent the flat-lying fault that has offset the main lode controlling stratigraphy.

Below this flat-lying structure, LUDD0002 intersected the ultramafic/komatiitic unit and the komatiiteandesite contact at 322.7m and, below that, the footwall andesite unit to the end of the hole at 471.4m. The hole also intersected a zone of quartz veining and sulphides from 370.14m to 371.0m, which is interpreted to represent the footwall extension to the historical Darcy Lode mineralisation (*Figure 2 and Figure 3*).

The hole returned low grade gold mineralisation in the interpreted target zone (0.86m at 0.26g/t Au from 370.14m)<sup>5</sup>. All assays have now been received for holes LUDD0001 and LUDD0002.

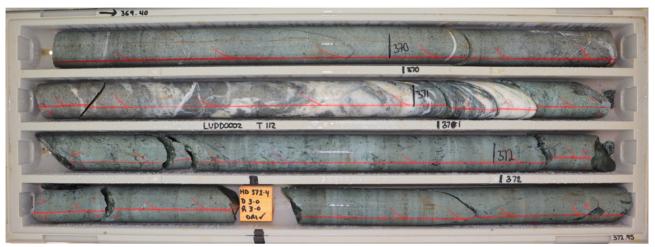


Figure 1: LUDD0002 core photo showing Darcy Lode quartz vein.

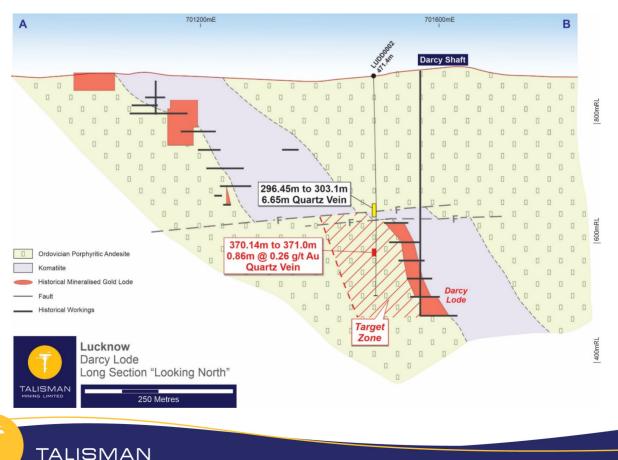




Figure 2: Long-section view (looking north) through Darcy Lode showing interpreted pierce point of hole LUDD0002.



Figure 3: Composite plan view (600mRL), showing interpreted geology and completed TLM drill holes.

#### **Future Targets**

The Lucknow Project remains prospective for the discovery of additional gold mineralisation, with the current geological interpretation suggesting that the prospective contact has been offset to the north-west by a sinistral fault which is trending north-west and dipping moderately to the north-east.

This newly interpreted target corridor to the north-west along the Lucknow Fault shows evidence of gold mineralisation in areas of minimal previous exploration (*Figure 4*) and will be a focus of further geological interpretation and review to inform potential future drilling.





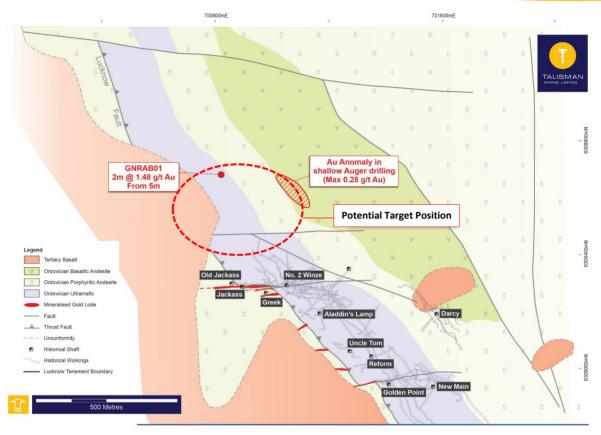


Figure 4: Lucknow Project mine shaft locations and simplified geology.

### Lachlan Copper-Gold Project, NSW

Talisman undertook a review of Lachlan Copper-Gold Project (Lachlan Project) prospects during the quarter, with the objective of recommencing field exploration activities during the December 2020 quarter.

Subsequent to the end of the September 2020 quarter, Reverse Circulation (RC) drilling programs were planned for implementation at the Cumbine gold and Blind Calf copper prospects as a priority. In addition, a ground electromagnetic (EM) survey at the Babinda copper prospect is also planned<sup>6</sup>.

#### Blind Calf-Dunbars Copper Lode System – Down-hole EM Anomalies

The Blind Calf Prospect includes several north-south trending mineralised structures which cover a total strike extent of 900m. To date, most of the exploration drilling has been directed towards the Blind Calf and Dunbars structures, where high-grade copper mineralisation has been intersected in bedrock drilling.

Structural and alteration mapping completed during 2019 identified three main mineralised corridors at Hilltop, Blind Calf-Dunbars and Engine – all trending in a north-south orientation (*Figure 5 and Figure 6*).

Chalcopyrite is the primary copper-bearing sulphide mineral at the Blind Calf Prospect, with very little pyrite or other sulphide minerals present.

<sup>&</sup>lt;sup>6</sup> Refer Talisman ASX announcement dated 20 October 2020 for full details including JORC tables.



TALISMAN

MINING LIMITED



As a result, the grade of the primary copper mineralisation has a strong correlation with the chalcopyrite content. While chalcopyrite is a low-conductance sulphide mineral, down-hole EM surveys are a very effective tool for detecting high-grade copper mineralisation in proximity to drill holes.

Talisman completed several RC drill holes during 2019 targeting the mineralised corridors at Hilltop and Engine with subsequent down-hole EM surveys detecting conductors at several locations (*Figure 5 and Figure 6*)<sup>7</sup>.

The conductors are interpreted to represent primary chalcopyrite mineralisation and will be tested with RC drilling during the December 2020 quarter.

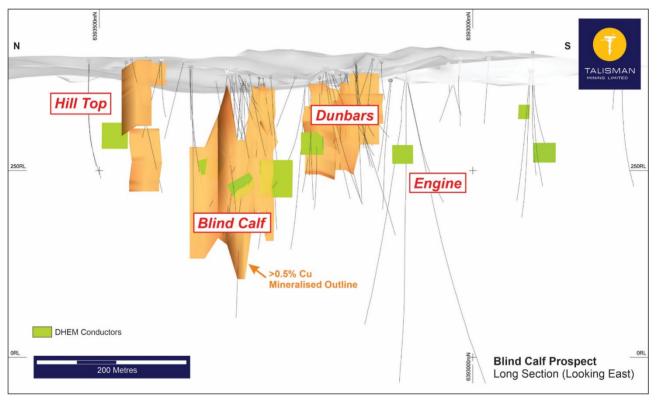


Figure 5: Blind Calf Prospect long-section (looking east) showing down-hole EM (DHEM) conductors.

<sup>&</sup>lt;sup>7</sup> Refer Talisman ASX announcement dated 9 September 2019 for full details including JORC tables.





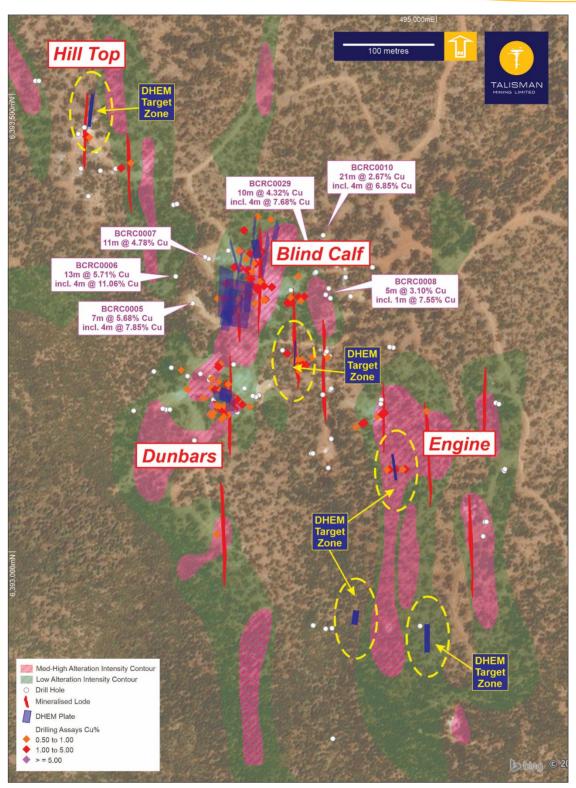


Figure 6. Blind Calf Prospect area showing alteration mapping and DHEM target zones for proposed RC drilling<sup>8</sup>.

<sup>&</sup>lt;sup>8</sup> Refer ASX announcements dated 5 July 2018, 30 November 2018 and 9 September 2019 for full details of drill hole intersections.





#### Cumbine

Historical wide-spaced soil sampling conducted by previous explorers at the Cumbine Gold Prospect identified an extensive gold anomaly covering an area of 1.1km by 600m (*Figure 7*)<sup>9</sup>.

Subsequent historical RC drilling intersected significant gold mineralisation (3 metres at 3.2 g/t Au in TMW005<sup>9</sup>) while more recent RC drilling by Talisman also intersected significant gold mineralisation including 7 metres at 1.95 g/t Au from 109m in CURC0003<sup>10</sup>.

Examination of petrology samples collected from Talisman's RC percussion drilling has identified strong, pervasive sericite alteration as well as pyrite mineralisation associated with the gold-bearing fluids. Additionally, a review of the drill assay data has indicated that the gold mineralisation has a very strong correlation with antimony (Sb). The soil sampling data shows three antimony anomalies that have not been drill tested (*Figure 7*) and which require further exploration in the form of mapping and in-fill soil sampling to better define drill targets.

The detailed aeromagnetic survey that Talisman completed during 2019 significantly improved the geological and structural interpretation over the prospect area. A 3-dimensional magnetic inversion model was created over the prospect area which has revealed a strong magnetic feature trending in a north-west orientation and dipping steeply towards the south-west. The planned RC drilling at Cumbine will target the eastern margin of the magnetic anomaly (*Figure 7*).

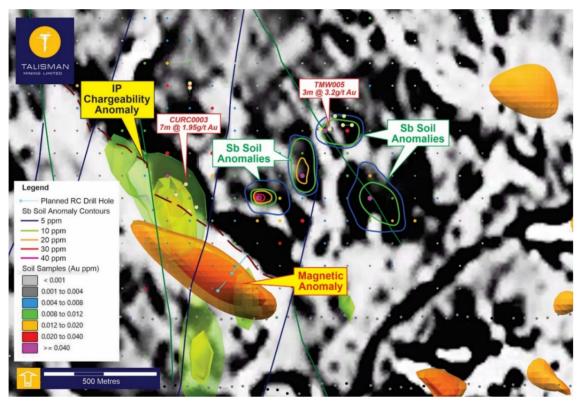


Figure 7: Cumbine Gold Prospect showing previous drilling, IP and magnetic anomalies and proposed RC drilling.

TALISMAN

MINING LIMITED

<sup>&</sup>lt;sup>9</sup> NSW DIGS report R00030150

<sup>&</sup>lt;sup>10</sup> Refer Talisman ASX announcement dated 30 November 2018 for full details including JORC tables.



#### Babinda

The Babinda copper prospect is located within the Canbelego-Mineral Hill Rift Zone and close to the Gilmore Suture. Historical mining at the prospect during the 1930's included two vertical shafts and copper oxide minerals (malachite and azurite) are abundant within the historical mine dumps.

The copper mineralisation is interpreted to be hosted within sub-vertical shear zones which appear to be axial planar to an NNW trending anticlinal structure.

Historical rock chip sampling<sup>11</sup>, and more recent soil sampling by Talisman, has identified copper anomalism over a strike extent of 800m (*Figure 8*). Talisman will undertake a ground EM survey over the prospective stratigraphy covering a total strike extent of 1.6km to identify potential sulphide conductors for future drilling.

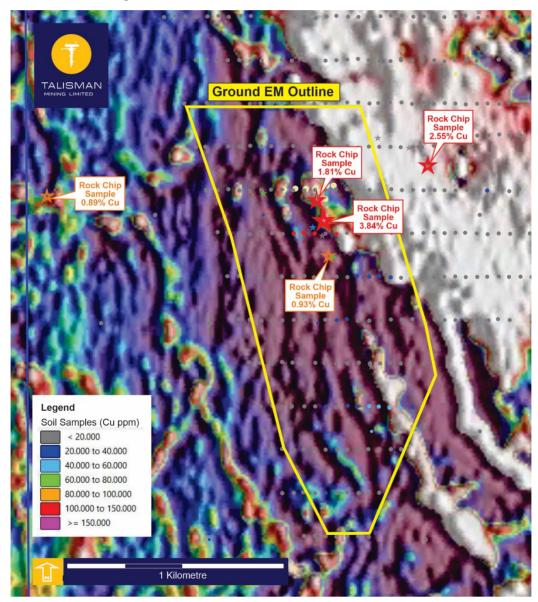


Figure 8: Babinda copper prospect<sup>11</sup>

 $^{11}\,$  NSW DIGS reports R00079058 and R00002743  $\,$ 





### **Corporate**

#### Senior Management Changes

During the Quarter, Talisman appointed experienced mining executive Shaun Vokes as Interim Chief Executive Officer, with a mandate to work closely with the Company's recently appointed Chairman, Mr Kerry Harmanis, and his advisory team on the identification and evaluation of new project opportunities, particularly in the Australian gold sector.

Mr Vokes succeeds Dan Madden, who has resigned as Managing Director to pursue a new career opportunity following 10 years of service to Talisman. Mr Madden will remain on the board as a non-executive director until the Company's AGM in November to facilitate a smooth handover.

Consistent with the Company's new focus and its desire to reduce corporate overheads, the position of General Manager – Geology has also been made redundant, as a result of which Tony Greenaway has left the Company.

Mr Vokes has more than 25 years' experience in the mining industry in Australia and Africa, including residential roles in Tanzania and Zambia, and brings a strong depth of experience in project evaluation together with financial, commercial, operational and leadership skills.

He was previously Chief Financial Officer and Company Secretary at Talisman between 2016 and 2020, where he was a key part of the executive team which successfully negotiated the \$72.3 million cash sale of the Company's interest in the Monty copper-gold joint venture and was pivotal to the sale of its interest in the Sinclair Nickel Project for \$10 million plus associated trailing royalties.

He has also held a number of senior executive roles in the international mining industry, including as Manager Business Services/CFO for Kabanga Nickel Company in Tanzania, Commercial and Business Development Manager for Saracen Gold Mines, a senior operational and residential role in Zambia and, earlier in his career, in senior analytical, accounting and managerial roles for WMC Resources, Dominion Mining and Normandy Poseidon.

#### **New Project Opportunities**

Talisman's business development team is continuing to review potential precious and base metal growth opportunities in Australia that complement its existing asset portfolio.

A range of opportunities including projects at the exploration stage and more advanced assets with near-term development and production potential, as well as value-accretive corporate transactions, have been, and continue to be, assessed to make sure Talisman finds the best assets with the potential to create long-term shareholder value.

#### Joint Ventures

Subsequent to the end of the September 2020 quarter, as announced to the ASX<sup>12</sup>, Haverford Holdings Pty Ltd (**Haverford**), a 100%-owned subsidiary of Talisman, entered into an unincorporated joint venture with Peel Mining Limited (ASX:PEX, **Peel**) over Peel's Mt Walton (EL8414) and Michelago (EL8451) Projects (collectively the Peel Tenements). Haverford has a 75% interest in the Peel Tenements and will act as the initial manager of the joint venture.

TALISMAN

MINING LIMITED



<sup>&</sup>lt;sup>12</sup> Refer Talisman ASX announcement dated 20 October 2020 for full details.



Both Haverford and Peel are now required to contribute funds to ongoing exploration activities on the Peel Tenements based on their percentage interest (Haverford 75% and Peel 25%) in order to maintain their respective interests. Standard dilution clauses apply to the parties' interests and, should a party's interest dilute to below 10%, it will automatically convert to a net smelter royalty of 1.5%.

In addition, as announced to the ASX<sup>12</sup>, Talisman B Pty Ltd (**TLMB**), a 100%-owned subsidiary of Talisman, has entered into an unincorporated joint venture with privately-owned Lucknow Gold Ltd (**LGL**) over LGL's Lucknow Gold Project (EL6455) (Lucknow Project). TLMB has a 51% interest in the Lucknow Project and will act as manager of the joint venture.

Both TLMB and LGL are now required to contribute funds to future activities on the Lucknow Project based on their percentage interest (TLMB 51% and LGL 49%) to maintain their respective interests. Standard dilution clauses apply to the parties' interests and, should a party's interest dilute to below 10%, it will automatically convert to a net smelter royalty of 1.0%.

#### Wonmunna Royalty

Talisman refers to the announcement by Mineral Resources Limited (ASX: MIN) (**MIN**) dated 23 October 2020, regarding, among other things, the commencement of proceedings by Fortescue Metals Group Limited (**FMG**) in relation to the Wonmunna mining leases M47/1423, M47/1424 and M47/1425 (**Wonmunna Mining Leases**) which are now indirectly owned by MIN.

Talisman is currently entitled to a 1% gross royalty from the holder of the Wonmunna Mining Leases on all metals produced and sold from the Wonmunna Mining Leases (see Talisman's ASX Announcement dated 17 February 2011). Talisman's right to receive a royalty in relation to future production from the Wonmunna Mining Leases may be adversely impacted depending on the outcome of FMG's proceedings.

While the precise impact of FMG's proceedings on the Wonmunna Mining Leases and Talisman's royalty is not currently clear, Talisman is seeking advice in relation to this matter and will update the market as appropriate.

#### **Cash Balance**

As at 30 September 2020, Talisman had \$11.1 million cash available for its operating and investing activities.

#### Payments to related parties of the entity and their associates

In accordance with Section 6.1 of the September 2020 quarter Appendix 5B, Talisman provides the following in relation to payments made during the quarter to related parties:

<b>Description</b>	<u>\$A'000</u>	Explanation
<b>Directors Fees</b>	386	Short term and post-employment benefits paid to executive and
		non-executive directors



TALISMAN

MINING LIMITED



## Ends

For further information, please contact: Shaun Vokes – Interim CEO on +61 8 93804230

Nicholas Read (Media inquiries) on +61 419 929 046

This release has been authorised by the Board of Talisman Mining Limited.





## **About Talisman Mining**

Talisman Mining Limited (ASX:TLM) is an Australian mineral development and exploration company. The Company's aim is to maximise shareholder value through exploration, discovery and development of complementary opportunities in base and precious metals.

Talisman has secured tenements in the Cobar/Mineral Hill region in Central NSW through the grant of its own Exploration Licenses and through separate farm-in agreements. The Cobar/Mineral Hill region is a richly mineralised district that hosts several base and precious metal mines including the CSA, Tritton, and Hera/ Nymagee mines. This region contains highly prospective geology that has produced many long-life, high-grade mineral discoveries. Talisman has identified a number of areas within its Lachlan Cu-Au Project tenements that show evidence of base and precious metals endowment which have had very little modern systematic exploration completed to date. Talisman believes there is significant potential for the discovery of substantial base metals and gold mineralisation within this land package and is undertaking active exploration to test a number of these targets.

Talisman has also entered into a farm-in with privately-owned Lucknow Gold Limited in relation to the Lucknow Gold Project (EL6455) in New South Wales. The Lucknow Goldfield was discovered in 1851 and was one of the earliest goldfields to be mined commercially in Australia. Historic production records at the Project are incomplete, however in excess of 400,000 ounces of gold has reportedly been produced at grades of 100 to 200 g/t gold<sup>13</sup>. Very little modern exploration has been completed outside of the existing mine workings and Talisman intends to undertake a program of geochemical surface sampling and mapping at the Project ahead of a drilling program to test for potential down plunge extensions of the high-grade gold ore shoots and repeat structures throughout the Project area.

## **Competent Person's Statement**

Information in this announcement that relates to Exploration Results and Exploration Targets is based on, and fairly represents information and supporting documentation complied by Mr Donald Huntly, who is a member of the Australasian Institute of Geoscientists. Mr Huntly is a full-time employee of Talisman Mining Ltd and has sufficient experience which is relevant to the style of mineralisation and types of deposits under consideration and to the activities undertaken to qualify as a Competent Person as defined in the 2012 Edition of the "Australian Code for Reporting of Mineral Resources and Ore Reserves". Mr Huntly has reviewed the contents of this announcement and consents to the inclusion in this announcement of all technical statements based on his information in the form and context in which they appear.

### **Forward-Looking Statements**

This ASX release may include forward-looking statements. These forward-looking statements are not historical facts but rather are based on Talisman Mining Ltd.'s current expectations, estimates and assumptions about the industry in which Talisman Mining Ltd operates, and beliefs and assumptions regarding Talisman Mining Ltd.'s future performance. Words such as "anticipates", "expects", "intends", "plans", "believes", "seeks", "estimates", "potential" and similar expressions are intended to identify forward-looking statements. Forward-looking statements are only predictions and are not guaranteed, and they are subject to known and unknown risks, uncertainties and assumptions, some of which are outside the control of Talisman Mining Ltd. Past performance is not necessarily a guide to future performance and no representation or warranty is made as to the likelihood of achievement or reasonableness of any forward-looking statements or other forecast. Actual values, results or events may be materially different to those expressed or implied in this presentation. Given these uncertainties, recipients are cautioned not to place reliance on forward looking statements. Any forward looking statements in this announcement speak only at the date of issue of this announcement. Subject to any continuing obligations under applicable law and the ASX Listing Rules, Talisman Mining Ltd does not undertake any obligation to update or revise any information or any of the forward looking statements in this announcement speak.

<sup>&</sup>lt;sup>13</sup> NSW DIGS report, First Annual Exploration Report EL5770, 2001 -R00030162



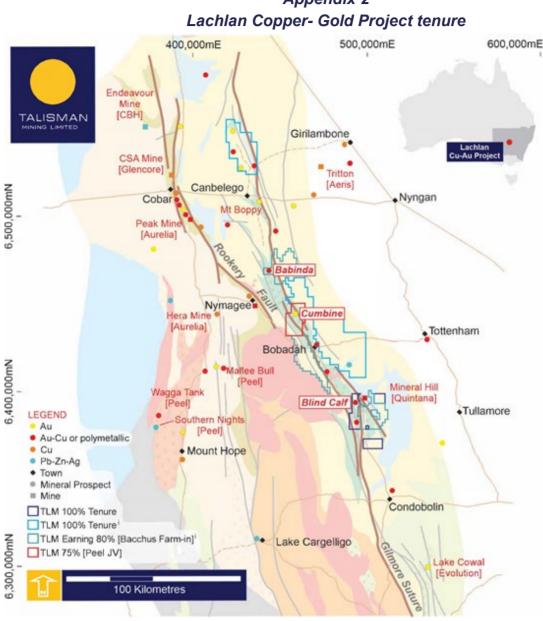


### Appendix 1 Talisman Tenement Holdings

Project / Tenement	Location and Blocks (Area)	Interest at Beginning of Quarter	Interest at End of Quarter	Acquired during Quarter	Surrendered during Quarter	Joint Venture Partner / Farm-In Party		
LACHLAN PROJECT	New South Wales							
EL8615	(726km <sup>2</sup> )	100%	100%	-	-	Bacchus Resources Pty Ltd (right to 20% interest)		
EL8659	(373km <sup>2</sup> )	100%	100%	-	-			
EL8677	(193km <sup>2</sup> )	100%	100%	-				
EL8414	(174km <sup>2</sup> )	0%	0%	-	-	Peel Mining Ltd (TLM earning up to 75%)		
EL8547	(205km <sup>2</sup> )	51%	51%	-	-	Bacchus Resources Pty Ltd (TLM earning up to 80%)		
EL8571	(258km <sup>2</sup> )	51%	51%	-	-			
EL8658	(256km <sup>2</sup> )	51%	51%	-	-			
EL8680	(20km <sup>2</sup> )	51%	51%	-	-			
EL8718	(86km <sup>2</sup> )	100%	100%	-	-	N/A		
EL8719	(191km <sup>2</sup> )	100%	100%	-	-			
OTHER	NSW				•	•		
EL8451	(276km <sup>2</sup> )	0%	0%	-	-	Peel Mining Ltd (TLM earning up to 75%)		
EL8977	(463km <sup>2</sup> )	100%	100%	-	-	N/A		
LUCKNOW PROJECT	New South Wales							
EL6455	(29km <sup>2</sup> )	0%	0%	-	-	Lucknow Gold Ltd (TLM earning up to 70%)		







**Appendix 2** 

As previously announced to the ASX<sup>14</sup>, Haverford Holdings Ltd (Haverford), a 100% owned subsidiary of Talisman, has entered into a Farm-In Agreement with Bacchus Resources Pty Ltd (Bacchus) over certain Lachlan Cu-Au Project tenements (FIA). The terms of the FIA were amended by the parties on 18 February 2020 to include a number of clarifications.

In accordance with the terms of the FIA (as amended):

- Haverford was deemed to have earned a 51% interest in the Bacchus Tenements (EL8547, EL8571, EL8638, EL8657, EL8658 and EL8680) by sole funding \$1.3M of on-ground exploration expenditure within the required three-year period; and
- Haverford could earn a further 29% interest in the Bacchus Tenements (being 80% in aggregate) by incurring a further \$0.6M of third-party exploration expenditure between 18 February 2020 and 17 August 2021 (Second Earn-In Period) on the Bacchus Tenements
- Bacchus is entitled to receive a 20% interest in the Haverford Tenements (EL8615, EL8659 and EL8677) at the end of the Second Earn-in Period; and
- at the end of the Second Earn-In Period, a formal joint venture will be entered into in respect of both the Bacchus Tenements and the Haverford Tenements which provides that Bacchus will be free carried for 10% of its joint venture interest until a decision to mine. Post a decision to mine, Bacchus can then elect whether to contribute or not, if Bacchus elects not to contribute, Haverford shall acquire Bacchus' interest in the joint venture for 95% of fair value as agreed by the joint venture participants or determined by an expert

Following a tenement review Haverford relinquished EL8638 (Rosevale) and EL8657 (Rookery).

<sup>&</sup>lt;sup>14</sup> Refer Talisman ASX announcement "Further NSW Gold and Base Metals Tenure Secured" 09 January 2018.



i



Appendix 3 Lucknow Gold Project tenure



