

QUARTERLY REPORT 31 MARCH 2021

30 April 2021

HIGHLIGHTS

- **Golden Swan Development**
 - Golden Swan Drill Drive extended 50 metres to improve drill angles for Golden Swan Resource Drilling program. Drill drive completed subsequent to quarter end
 - Golden Swan resource drilling plan completed, program commenced end of April 2021 and is estimated to take three months to complete
 - Dialogue with potential offtake parties for Direct Shipping Ore commenced
- **Southern Terrace Exploration**
 - First hole drilled in the Southern Terrace exploration program targeting 120 metres below first high-grade intersection at Golden Swan
- **Windarra Gold Tailings Project**
 - Definitive Feasibility Study well progressed, expected completion over the next quarter
 - Termination of Windarra State Agreement progressing and on track to be completed late next quarter
- **Corporate/Finance**
 - Poseidon added to the All Ordinaries Index following March 2021 rebalance
 - Support from Managing Director Peter Harold with 500,000 on-market share purchase
 - Cash position of \$15.4 million on 31 March 2020, down from \$20.1 million at the end of the December 2020 quarter

Poseidon Nickel (ASX: POS, “the Company”) is pleased to report on its activities for the March quarter 2021.

Managing Director and CEO, Peter Harold, commented: *“Over the quarter the Company made significant progress toward exploitation of the Golden Swan mineralisation with development of the drill drive largely completed over the quarter. The drill drive was completed post quarter end providing optimal positioning for Golden Swan Resource drilling which commenced this week. WestAuz completed the drill drive to a high quality and most importantly with no safety incidents.*

Despite challenging ground conditions, we progressed the Southern Terrace exploration program with drilling continuing from a position just off the Silver Swan decline. The ground conditions encountered further support our decision to develop the drill drive. The Company will undertake future Southern Terrace exploration from the drill platform at the end of the new drill drive. There is a lot going on at Poseidon with the focus over the June quarter on made progressing the Golden Swan Resource drilling program, further drilling to test the potential of the Southern Terrace, completion of the Windarra Gold Tailings Definitive Feasibility study and progressing the Lake Johnston strategic review. Shareholders can expect a significant increase in news flow compared to the March quarter.”

Golden Swan Development

WestAuz made significant progress on the Golden Swan drill drive over the March quarter with 80% of the drive completed by quarter end. The Board approved a 50 metre extension to the drill drive following a detailed review of the planned resource drilling program. The drill drive extension was approved for the following reasons:

- reduce the amount of drilling in the ultramafic (less competent rock);
- provide a better drilling angle for all planned holes; and
- the end of the drive will be 50 metres closer to the mineralisation which should reduce mine development time.

Progress of the drill drive and the updated drill platform position are presented in Figure 2.

WestAuz completed the drill drive subsequent to quarter end safely and without incident. Webdrill have mobilised to commence the Golden Swan resource drilling program, which is estimated to take three months to complete.



FIGURE 1 – WESTAUZ AT WORK IN THE GOLDEN SWAN DRILL DRIVE

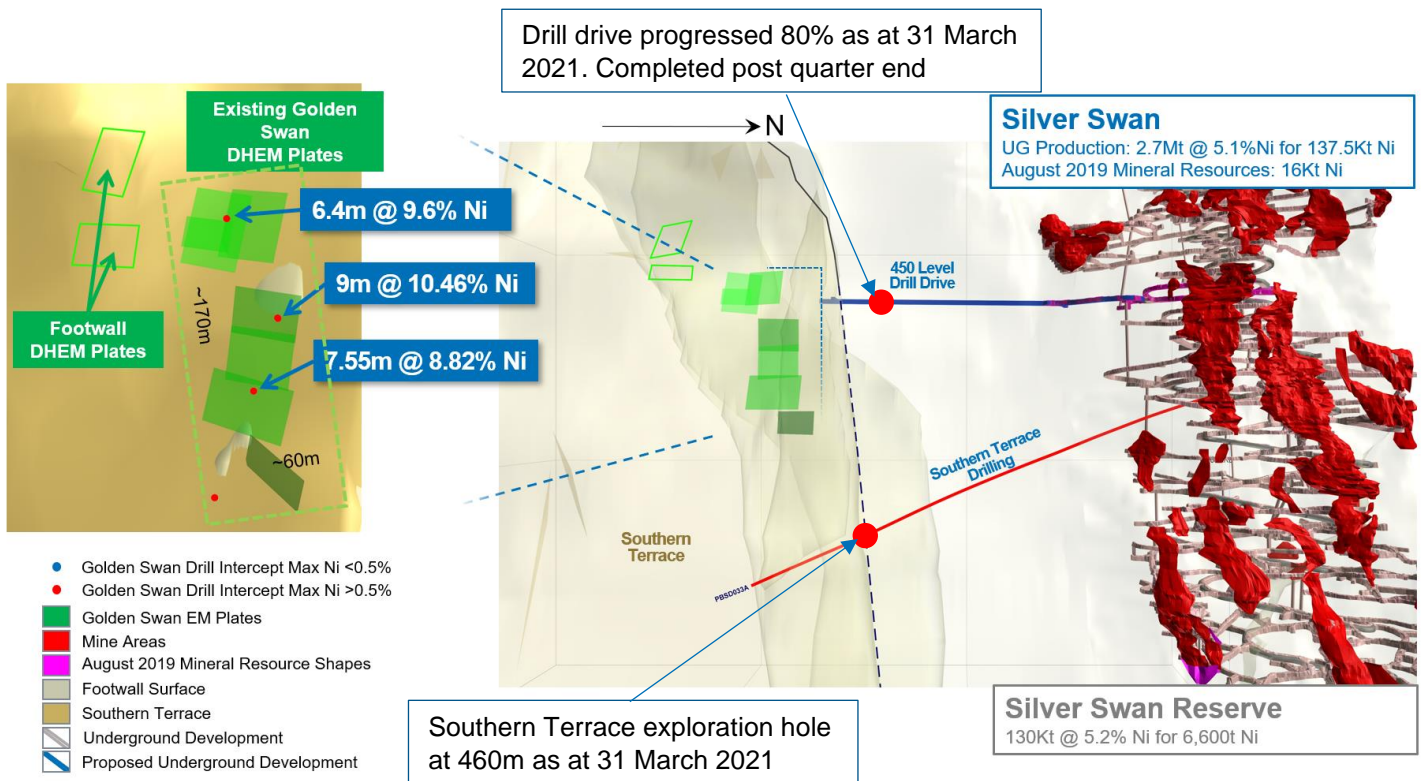


FIGURE 2 – SUMMARY OF PROJECT ADVANCEMENTS ACHIEVED OVER THE MARCH 2021 QUARTER¹

Southern Terrace Exploration

The Company recommenced exploration drilling of the Southern Terrace in late January from the 335 Level just off the Silver Swan decline. The aim of this drilling is to test for additional mineralisation below the existing known high-grade nickel sulphide mineralisation at Golden Swan.

The drill hole, PBSD033A, targeted a zone about 120 metres below the original discovery hole at Golden Swan (refer Figure 2). The hole is planned to go to a depth of 750 metres and was at about 410 metres when the rods were bogged and grouted in. Webdrill, at their cost, agreed to wedge the hole at 220 metres and redrill to 410 metres down hole.

As at 31 March 2021 the hole was at a depth of 460 metres.

Post quarter end hole PBSD033A passed just over the modelled Southern Terrace position, clipping the Southern Terrace felsic at its northernmost position. The hole finished at 602.8 metres (planned 800 metres) in cumulate textured ultramafic. The subsequent downhole electromagnetic survey (DHEM) survey did not return any strong anomalies. It was decided not to continue the hole to its planned depth due to adverse ground conditions. Going forward, drilling will be undertaken from the Golden Swan drill drive to further test the Southern Terrace down plunge from the modelled EM plates².

The Southern Terrace remains open and prospective for further high-grade nickel sulphide mineralisation and the new drill drive provides a favourable platform from which to further test this area.

¹ Refer ASX Announcement “Assay Confirm More High-Grade Nickel at Golden Swan” dated 25 November 2020

² Refer ASX Announcement “Golden Swan Drill Drive Completed & Resource Definition Drilling Underway” dated 29 April 2021

Windarra Gold Tailings

Definitive Feasibility Study

The Definitive Feasibility Study (**DFS**) for the Windarra Gold Tailings project progressed over the quarter with the work being undertaken by Como Engineering effectively completed.

The Company was approached to consider an alternative mining method to hydraulic mining, which is expected to reduce capital and operating costs of the project. The process of considering this alternative mining method will take an additional 4-6 weeks which means the delivery of the DFS will now be late in the June quarter.

Operating Update

Black Swan

Primary activities at Black Swan over the quarter supported the Golden Swan drill drive development and Southern Terrace exploration program.

Windarra

With the exception of progressing the Gold Tailings project, only care and maintenance activities were conducted at Windarra over the period.

Lake Johnston

Lake Johnston remained on care and maintenance during the quarter.

As previously announced the Company is currently undertaking a strategic review of the Lake Johnston asset to determine the best way to progress the project given the more positive outlook for nickel. Lake Johnston remains a valuable asset to Poseidon. Resource allocation (personnel and funds) directed toward Black Swan and Windarra may restrict the potential for Lake Johnston to present value in a timeframe similar to the other two projects. The strategic review may include divestment, joint venture, updated restart studies, recommencing exploration or other avenues that are value accretive for Poseidon shareholders.

COVID Update

The Company and its contractors continue to operate within the safe operating parameters as per the WA Government requirements.

Financial

As at 31 March 2021, the Company held cash and current investments totaling \$15.4 million.

Over the March 2021 quarter, Poseidon's net cash outflow from operating and investing activities totalled \$4.6 million. Expenditures included \$3.5 million of exploration and evaluation costs, of which \$2.2 million was spent progressing the Golden Swan drill drive, \$0.2 million on exploration activities and \$0.1 million on the Windarra gold tailings project. The remainder of exploration and evaluation costs relate to operations supporting these projects and care & maintenance activities across the three sites.

Costs incurred over the quarter amounted to \$6.5 million compared to a forecast of \$6.1 million, with the variance to forecast primarily resulting from additional costs incurred completing the Golden Swan drill drive. Total cash expenditure for the quarter was \$4.7 million, representing a timing difference due to a large portion of March 2021 payments deferred into April 2021.

There were no production or development activities conducted over the quarter and as such no production or development expenditures were incurred.

Related party expenses over the quarter totalled \$0.1 million:

- \$10,195 paid to Black Mountain Metals Pty Ltd for consultancy services provided to Poseidon with regards to technical studies conducted on Poseidon's mining assets; and
- \$73,705 fees paid to Directors.

Poseidon has forecasted expenditure of \$7.6 million over the next quarter, of which \$1.7 million is estimated to complete development of the Golden Swan drill drive, \$3.4 million to fund exploration programs and \$0.1 million on the Windarra Gold Tailings Project. The remaining expenditure includes support services for works being undertaken at Black Swan, care and maintenance costs at Lake Johnston and Windarra and corporate costs.

Poseidon continues to assess its ongoing funding requirements and will carry on engaging with potential financiers in parallel with progressing projects, in particular the Black Swan restart and Windarra gold tailing project.

Other

Over the quarter S&P Dow Jones Indices announced changes in the S&P/ASX Indices, effective prior to the open of trading on March 22, 2021. **The quarterly indices rebalance included Poseidon entering the ASX All Ordinaries index.**

Poseidon Managing Director Peter Harold has demonstrated his support for the Company with a 500,000 on-market share purchase.

In early January 2021 the Company announced completion of the sale of Poseidon shares under the Less than Marketable Parcel Share Sale Facility. Based on the closing price on ASX on 6 October 2020 of \$0.053 per Poseidon Share, a Less Than a Marketable Parcel of Poseidon Share was any holding of 9,433 Poseidon Shares or fewer. As at the record date, there was 4,086 holdings of Poseidon Shares of Less Than a Marketable Parcel (from a total of 9,235 holdings), totalling 9,916,806 Poseidon Shares and constituting approximately 0.38% of the 2,642,701,831 total Poseidon Shares on issue. The final number of Poseidon shares sold under the Facility was 7,397,196 Poseidon shares from 3,389 shareholders.

During the period the Company changed its shareholder registry services provider from Computershare Investor Services Pty Ltd to Automic Pty Ltd. Please refer to our ASX Announcement – Change of Share Registry Details, dated 8th January 2021, for further information.

There were no material changes in mineral tenements during the period (as shown in Table 3).

This Quarterly Activities Report was authorised for release by the Poseidon Board of Directors.



Peter Harold

Managing Director and CEO

30 April 2021

For further information contact Peter Harold: + 61 (0)8 6167 6600.

About Poseidon Nickel Limited

Poseidon Nickel Limited (ASX Code: POS) is a nickel sulphide exploration and development company with three projects located within a radius of 300km from Kalgoorlie in the Goldfields region of Western Australia and a resource base of around 400,000 tonnes of nickel and 180,000 ounces of gold.

Poseidon's strategy is focused on the exploration and eventual restart of its established nickel operations in Western Australia where project risk capital and operating costs are low. A critical element of this strategy has been to acquire projects and operations with high levels of geological prospectivity likely to lead to potential substantial extension of the operation's life through the application of modern exploration techniques.

Poseidon owns the Windarra, Black Swan and the Lake Johnston Nickel Projects. In addition to the mines and infrastructure including concentrators at Black Swan and Lake Johnston, these projects have significant exploration opportunities demonstrated by the discovery of the Abi Rose deposit at Lake Johnston and the recent discovery of the Golden Swan mineralisation at Black Swan. The Company is also undertaking a Definitive Feasibility Study on retreating the gold tailings at Windarra given the strength of the A\$ gold price.

MINERAL RESOURCE STATEMENT

Table 1: Nickel Projects Mineral Resource Statement

Nickel Sulphide Resources	JORC Compliance	Cut Off Grade	MINERAL RESOURCE CATEGORY												
			INDICATED			INFERRED			TOTAL						
			Tonnes (Kt)	Ni% Grade	Ni Metal (t)	Tonnes (Kt)	Ni% Grade	Ni Metal (t)	Tonnes (Kt)	Ni% Grade	Ni Metal (t)	Co% Grade	Co Metal (t)	Cu% Grade	Cu Metal (t)
BLACK SWAN PROJECT															
Black Swan	2012	0.40%	9,600	0.68	64,900	21,100	0.54	113,800	30,700	0.58	179,000	0.01	4,200	NA	-
Silver Swan	2012	4.50%	108	9.4	10,130	61	9.7	5,900	168	9.5	16,030	0.19	316	0.4	679
LAKE JOHNSTON PROJECT															
Maggie Hays	2012	0.80%	2,600	1.60	41,900	900	1.17	10,100	3,500	1.49	52,000	0.05	1,800	0.10	3,400
WINDARRA PROJECT															
Mt Windarra	2012	0.90%	922	1.56	14,500	3,436	1.66	57,500	4,358	1.64	72,000	0.03	1,200	0.13	5,700
South Windarra	2004	0.80%	772	0.98	7,500	-	-	-	772	0.98	7,500	NA	-	NA	-
Cerberus	2004	0.75%	2,773	1.25	34,600	1,778	1.91	34,000	4,551	1.51	69,000	NA	-	0.08	3,600
TOTAL															
Total Ni, Co, Cu Resources	2004 & 2012	-	16,775	1.03	173,530	27,275	0.81	221,300	44,049	0.90	395,530	0.02	7,516	0.03	13,379

Note: totals may not sum exactly due to rounding. NA = information Not Available from reported resource model. The Indicated Mineral Resources are inclusive of those Mineral Resources modified to produce the Ore Reserves.

Black Swan Resource as at 22 July 2014 (see ASX announcement "Poseidon Announces Black Swan Mineral Resource" released 4th August 2014)

Silver Swan Resource as at 5 August 2019 (see ASX announcement "Silver Swan Resource Upgrade" released 5th August 2019)

Maggie Hays Resource as at 17 March 2015 (see ASC announcement "50% Increase in Indicated Resources at Lake Johnston" released 17th March 2015)

Mt Windarra Resource as at 7 November 2014 (see ASX announcement "Poseidon Announces Revised Mt Windarra Resource" released 7th November 2014)

South Windarra and Cerberus Resource as at 30 April 2013 (see ASX announcement "Resource Increase of 25% at Windarra Nickel Project" released 1st December 2011)

The Company is not aware of any new information or data that materially affects the information in the relevant market announcements. All material assumptions and technical parameters underpinning the estimates in the relevant market announcements continue to apply and have not materially changed.

ORE RESERVE STATEMENT

Table 2: Nickel Projects Ore Reserve Statement

Nickel Sulphide Reserves	JORC Compliance	ORE RESERVE CATEGORY		
		PROBABLE		
		Tonnes (Kt)	Ni% Grade	Ni Metal (t)
SILVER SWAN PROJECT				
Silver Swan Underground	2012	130	5.2	6,800
Black Swan Open pit	2012	3,370	0.63	21,500
TOTAL				
Total Ni Reserves	2012	3,500	0.81	28,300

Note: Calculations have been rounded to the nearest 10,000 t of ore, 0.01 % Ni grade 100 t Ni metal and 10t of cobalt metal.

Silver Swan Underground Reserve as at 26 May 2017 (see ASX announcement "Silver Swan Definitive Feasibility Study" released 26th May 2017) Black Swan Open Pit Reserve as at 5 November 2014 (see ASX announcement "Poseidon Announces Black Swan Ore Reserve" dated 5th November 2014).

The Company completed an upgrade to the Silver Swan Indicated Resource in 2019 which was based upon the 2015 Silver Swan Resource Estimate (refer to Table 1 above for the new Silver Swan Resource estimate). At this point it is not known the impact the upgrade to the Silver Swan Resource will have on the Silver Swan Reserve.

The Company is not aware of any other information or data that materially affects the information in the relevant market announcements for the Black Swan Open Pit Reserve. All material assumptions and technical parameters underpinning the estimates in the relevant market announcements continue to apply and have not materially changed.

TENEMENTS HELD

Table 3: Tenements held as at 31 March 2021

AREAS OF INTEREST	TENEMENTS	ECONOMIC ENTITY'S INTEREST
Western Australia		
Windarra Nickel Assets	MSA 38/261, G38/21, L38/121, L39/184, L38/199, L38/218, L39/221	100%
Windarra South	MSA 38/261, L38/119, L38/122, L38/220	100%
Woodline Well	M39/1075, L39/224	100%
Pool Well	M38/1244, M38/1245, L38/118	100%
Lake Johnston Nickel Assets	E63/1067, G63/0008, G63/0005, L63/0051, L63/0052, L63/0055, L63/0057, M63/0163, M63/0282, M63/0283, M63/0284, M63/0292, M63/0293, M63/0294, M63/0522, M63/0523, M63/0524, E63/1784	100%
Black Swan Nickel Assets	M27/0039, M27/0200, M27/0214, M27/0216, L27/0057, L27/0058, L27/0059, L27/0074, L27/0075, L27/0077, L27/0078, L24/0219, L24/0222, G27/2	100%

E = Exploration Licence M = Mining Lease MSA = Mining Tenement State Act PL = Prospecting Licence L = Miscellaneous Licence

[Mining Tenements Acquired or Disposed during the June 2020 Quarter](#)

Nil

[Beneficial Percentage Interests Held in Farm-In or Farm-Out Agreements during the September 2020 Quarter](#)

Nil

[Beneficial Percentage Interests Held in Farm-In or Farm-Out Agreements Acquired or Disposed of during the September 2020 Quarter](#)

Nil

COMPETENT PERSON STATEMENTS:

The information in this report that relates to Exploration Results is based on, and fairly represents, information compiled and reviewed by Mr Graham Leaver, who was an employee of Poseidon Nickel, and is a Member of The Australian Institute of Geoscientists.

The information in this report which relates to the Black Swan Mineral Resource is based on, and fairly represents, information compiled by Mr Andrew Weeks who is a full-time employee of Golder Associates Pty Ltd. The information in this report which relates to the Black Swan Ore Reserve is based on, and fairly represents, information compiled by Mr Andrew Weeks who is a full-time employee of Golder Associates Pty Ltd and who is a Members of the Australasian Institute of Mining and Metallurgy.

The information in this report which relates to the Silver Swan Mineral Resource is based on, and fairly represents, information compiled by Mr Steve Warriner, Chief Geologist, who was a full-time employee at Poseidon Nickel, and is a Member of The Australian Institute of Geoscientists and Mr Kahan Cervoj who is a full time employee of Optiro Pty Ltd and is a Fellow of the Australasian Institute of Mining and Metallurgy. The information in this report which relates to the Silver Swan Ore Reserve is based on, and fairly represents, information compiled by Mr Matthew Keenan who is a full-time employee of Entech Pty Ltd and is a Member of the Australasian Institute of Mining and Metallurgy.

The information in this report which relates to the Lake Johnston Mineral Resource is based on, and fairly represents, information compiled by Mr Steve Warriner, Chief Geologist, who was a full-time employee at Poseidon Nickel, and is a Member of The Australian Institute of Geoscientists and Mr Andrew Weeks who is a full-time employee of Golder Associates Pty Ltd and is a Member of the Australasian Institute of Mining and Metallurgy. The information in this report which relates to the Lake Johnston Ore Reserves Project is based on, and fairly represents, information compiled by Mr Matthew Keenan who is a full time employee of Entech Pty Ltd and is a Member of the Australasian Institute of Mining and Metallurgy.

The information in this report that relates to Mineral Resources at the Windarra Nickel Project and Gold Tailings Project is based on, and fairly represents, information compiled by Mr Steve Warriner, Chief Geologist, who was a full-time employee at Poseidon Nickel, and is a Member of The Australian Institute of Geoscientists and Mr Ian Glacken who is a full time employee of Optiro Pty Ltd and is a Fellow of the Australasian Institute of Mining and Metallurgy. The Windarra Project contains Mineral Resources which are reported under JORC 2004 Guidelines as there has been no Material Change or Re-estimation of the Mineral Resource since the introduction of the JORC 2012 Codes. Future estimations will be completed to JORC 2012 Guidelines.

Mr Leaver, Mr Warriner, Mr Cervoj, Mr Weeks, Mr Glacken and Mr Keenan all have sufficient experience which is relevant to the style of mineralisation and type of deposits under consideration and to the activity which they are 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' (the JORC Code 2012). Mr Leaver, Mr Warriner, Mr Cervoj, Mr Weeks, Mr Glacken and Mr Keenan have consented to the inclusion in the report of the matters based on his information in the form and context in which it appears.

The Australian Securities Exchange has not reviewed and does not accept responsibility for the accuracy or adequacy of this release.

FORWARD LOOKING STATEMENT – INFERRED RESOURCE STATEMENTS:

The Company notes that an Inferred Resource has a lower level of confidence than an Indicated Resource and that the JORC Codes, 2012 advises that to be an Inferred Resource it is reasonable to expect that the majority of the Inferred Resource would be upgraded to an Indicated Resource with continued exploration. Based on advice from relevant competent Persons, the Company has a high degree of confidence that the Inferred Resource for the Silver Swan deposit will upgrade to an Indicated Resource with further exploration work.

The Company believes it has a reasonable basis for making the forward looking statement in this announcement, including with respect to any production targets, based on the information contained in this announcement and in particular, the JORC Code, 2012 Mineral Resource for Silver Swan as of May 2016, together with independent geotechnical studies, determination of production targets, mine design and scheduling, metallurgical testwork, external commodity price and exchange rate forecasts and worldwide operating cost data.

FORWARD LOOKING STATEMENTS:

This release contains certain forward looking statements including nickel production targets. Often, but not always, forward looking statements can generally be identified by the use of forward looking words such as "may", "will", "except", "intend", "plan", "estimate", "anticipate", "continue", and "guidance", or other similar words and may include, without limitation, statements regarding plans, strategies and objectives of management, anticipated production and expected costs. Indications of, and guidance on future earnings, cash flows, costs, financial position and performance are also forward looking statements

Forward looking statements, opinions and estimates included in this announcement are based on assumptions and contingencies which are subject to change, without notice, as are statements about market and industry trends, which are based on interpretation of current market conditions. Forward looking statements are provided as a general guide only and should not be relied on as a guarantee of future performance.

Forward looking statements may be affected by a range of variables that could cause actual results or trends to differ materially. These variations, if materially adverse, may affect the timing or the feasibility and potential development of the Silver Swan underground mine.