

1<sup>st</sup> December 2011

Company Announcements Officer  
ASX Limited  
Exchange Centre  
Level 4, 20 Bridge Street  
SYDNEY NSW 2000

Dear Sir

**Re: RESOURCE INCREASE OF 25% AT WINDARRA NICKEL PROJECT**

We enclose herewith a copy of an announcement in relation to the above.

Yours faithfully



**David P.A. Singleton**  
MANAGING DIRECTOR &  
CHIEF EXECUTIVE OFFICER

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**CORPORATE DIRECTORY**

**Director / Senior Management**

David Singleton	Managing Director & Chief Executive Officer
Andrew Forrest	Non-Executive Chairman
Geoff Brayshaw	Non-Executive Director
Richard Monti	Non-Executive Director
Chris Indermaur	Non-Executive Director
Ross Kestel	Company Secretary

**Corporate Enquiries**

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**Home Exchange**

The Company's shares are listed on the Australian Securities Exchange and the home exchange is Perth  
ASX code: POS

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ASX Announcement

1<sup>st</sup> December 2011

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**Resource Increase of 25% at Windarra Nickel Project**

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- **Current Drilling Programme now complete at Cerberus and has demonstrated continuity of mineralisation from 64m below surface (previously 110m) to 700m depth.**
- **Cerberus Mineral Resource increase to 68,633 tonnes nickel and is now larger than Mt Windarra.**
- **Global Mineral Resource at the Windarra project now stands at 9,187,449 tonnes at 1.51% for 138,366 tonnes nickel, a 25% increase to previously reported tonnage.**
- **Approximately half of the Windarra Nickel Project resource is now classified as Indicated.**
- **Cerberus full feasibility study including Ore Reserve calculation will be completed by the end of this year.**

Poseidon Nickel Limited (ASX:POS) is pleased to announce that it has completed the drilling programme at Cerberus announced earlier this year and an associated recalculation of the Mineral Resource size. The drilling programme has resulted in infill drilling to 350 metres vertical depth below surface. In addition recent drilling combined with the infill drilling has demonstrated that the **zones of mineralisation near to the surface and at depth are in fact linked to a continuous zone of mineralisation**. This outcome was expected but had not been adequately demonstrated from previous drilling that concentrated on the near surface extent of the mineralisation.

In addition, the drilling programme was designed to test the limits of the mineralisation near the surface. The programme adequately demonstrated that the mineralisation is present at a depth of 64 metres from the surface. Taken together with the deeper infill drilling, the mineralised zone has now been demonstrated to extend continuously from 64 metres below surface to at least 700 metres below surface which is the current maximum depth drilled. The Cerberus mineralised zone presents as a shallowly dipping plane that extends approximately 1.4kms down dip and 400 metres across strike.

The drilling programme has also demonstrated that the mineralisation is made up of at least 3 parallel zones or stacked lodes. The Mt Windarra deposit, located 10kms to the north, is made up of 6 similarly stacked lodes (termed "shoots" historically). **Poseidon's geologists believe that additional lodes have been identified to the north and south at Cerberus** in areas largely untested by drilling. Further resource extension is therefore likely, which will be the subject of future drilling programmes.

The new drilling assay data has been added to the existing data and a resource recalculated by independent consultants Optiro Pty Ltd for Poseidon. The new Cerberus Mineral Resource is shown in Table 1 and amounts to 68,600 tonnes of nickel at a 0.75% nickel cut-off (similar to that used for Mt Windarra for comparison purposes). The Cerberus

deposit is now larger than the Mt Windarra Mineral Resource and further reinforces Poseidon's position as having **the largest nickel sulphide resource of any of the higher grade nickel exploration/development companies in Australia.**

Poseidon Nickel is developing the Windarra Nickel Project in Western Australia. The project is a higher grade nickel sulphide deposit that has demonstrated high recovery levels through a standard nickel floatation concentrator. The total current Mineral Resource is located at two positions approximately 10kms apart and includes the existing brownfields mine at Mt Windarra and a new discovery at Cerberus. Poseidon is on track to complete its definitive feasibility study by the end of 2011 and is targeting initial concentrate production in 2013. The concentrator plant to be constructed at Mt Windarra is expected to have a nameplate capacity of 700,000 tonnes of ore per annum.

*Note: The information in this report relates to Exploration Results and Mineral Resources based on information compiled by Mr N Hutchison, General Manager of Geology at Poseidon Nickel, who is a Member of The Australian Institute of Geoscientists and Mr I Glacken who is a Fellow of the Australasian Institute of Mining and Metallurgy and a full time employee of Optiro Pty Ltd. Mr Hutchison and Mr Glacken both 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 2004 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves.' Mr Hutchison and Mr Glacken 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.*

**Table 1: Windarra Nickel Project Resource Statement**

Windarra Nickel Project Sulphides	Cut Off Grade	Resource Category								
		Indicated			Inferred			TOTAL		
		Tonnes	Ni% Grade	Ni Metal t	Tonnes	Ni% Grade	Ni Metal t	Tonnes	Ni% Grade	Ni Metal t
<b>Mt Windarra</b>	0.75%	910,000	1.24	11,300	2,955,000	1.72	50,900	3,865,000	1.61	62,200
<b>South Windarra</b>	0.80%	772,000	0.98	7,500	-	-	-	772,000	0.98	7,500
<b>Cerberus</b>	0.75%	2,773,000	1.25	34,600	1,778,000	1.91	34,000	4,551,000	1.51	68,600
<b>Total Sulphide</b>		<b>4,454,706</b>	<b>1.20</b>	<b>53,470</b>	<b>4,732,743</b>	<b>1.79</b>	<b>84,896</b>	<b>9,187,449</b>	<b>1.51</b>	<b>138,366</b>