



## Sirius Resources NL

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### Projects:

**Fraser Range** nickel-copper, gold

**Polar Bear** gold, nickel

## MORE HIGH GRADE GOLD HITS AT BALOO

### Key points

- **Best gold hit yet at Baloo - 24m @ 4.87g/t gold** from the start of sampling at 4m to the end of the drillhole in quartz vein, including **6m @ 13.7g/t gold**
- Other gold intersections in aircore drilling at Baloo from the start of sampling to the end of hole in quartz veining
- First diamond hole to penetrate the quartz veined zone at Baloo is underway and has **so far intersected several thick zones of quartz veining** – assays expected next week
- Another 250km<sup>2</sup> of gold prospective ground picked up with Baloo-style gold potential
- Second reconnaissance hole at Crux partially completed – Nova-style hostrock with minor trace sulphides intersected

Sirius Resources NL (ASX:SIR) (“Sirius” or the “Company”) advises that the latest assays received from ongoing aircore drilling have identified the best gold intersection yet from the Baloo gold deposit on its 100% owned Polar Bear project.

An additional 83 aircore holes for a total of 224 have now been drilled since the initial ASX announcement on 20<sup>th</sup> January 2015, and assay results have now been received for 58 of these, with 41 being previously reported.

### Best aircore intersection yet at Baloo

Seven successive aircore holes drilled across a 50 metre wide zone on the 6,480,960N line intersected gold mineralisation from the first sample taken (at depths of 3-4m at the base of lake sediments) to the end of each drillhole. These holes penetrated the weathered (oxide) part of the deposit and finished in mineralised quartz veins at depths ranging from as little as 7 metres (where they were unable to penetrate the hard quartz veins) to as much as 77 metres (on the margins of the quartz veined zone).

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The new intersections are detailed in Appendix 1 and key intersections are summarised below and shown in Figures 1 and 2 (note, EOH means to the end of the hole):

- **24m @ 4.87 g/t Au** from 4 metres to EOH, including **6m @ 12.43 g/t Au** from 12 metres in SPBA2372 (ending in quartz vein)
- **4m @ 8.61 g/t Au** from 3 metres to EOH in SBPA2370 (ending in quartz vein)
- **39m @ 0.74 g/t Au** from 38 metres to EOH in SPBA2373 (ending in quartz vein)
- **2m @ 1.05 g/t Au** from 19 metres to EOH in SPBA2371 (ending in quartz vein)

Several holes drilled on the 6,481,040N line (80 metres north of the line described above) intersected narrow widths of supergene mineralisation where a north-northeast trending fault is thought to offset the primary mineralisation eastwards (*see Figure 1*).

The infill aircore drilling program has been completed and the aircore rig is now probing north and south of Baloo for potential strike extensions.

## First diamond drillhole at Baloo

The first diamond drillhole (SPBD0090) is in progress and as of Sunday evening was at a depth of 63 metres. This hole is located in the central part of the deposit and designed to confirm the presence, nature and width of the quartz veined zone thought to be the source of the oxide zone gold mineralisation intersected to date in the aircore drilling (*see Figure 3*).

The hole has so far intersected several zones of quartz veins within a wide shear zone directly beneath the oxide mineralisation identified in the aircore drilling (*see Figures 4 and 5*). This shear zone occurs at the contact between black shales or mudstones and andesitic volcanics, which is very similar to the geological setting of Gold Fields' Invincible deposit at St.Ives +15 million ounce camp directly to the north.

The hole is continuing but it must be stressed that visual criteria alone are not necessarily a reliable indicator of the presence or grade of gold mineralisation and that laboratory assays provide the only definitive guide. Assays for this hole are expected next week.

## More Baloo-style gold targets to drill at Polar Bear

In addition to drilling in the immediate vicinity of Baloo, Sirius will be expanding its gold reconnaissance drill program to follow up previous gold intersections at the Nanook prospect (11 kilometres to the south), to follow up gold anomalism previously identified in a single reconnaissance hole drilled 4 kilometres to the south of Baloo at the Monsoon prospect, and to test another target 5 kilometres north of Baloo.

## Ground expansion over prospective areas

Baloo is in an unusual geological setting that is different to that of most of the known gold deposits in the Eastern Goldfields, and together with the Invincible deposit represents a new type of exploration opportunity in areas not previously considered to be prospective for gold.

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As a result of this, Sirius has further expanded its ground holding in the district, applying for an exploration licence covering approximately 250 square kilometres of relatively unexplored ground containing similar geology in a corridor to the east of the Polar Bear project (see *Figure 6*). This is termed the Norcott project.

## Crux progress

Downhole EM undertaken on the first hole that previously intersected localised zones of disseminated and a zone of matrix sulphides (see previous ASX announcement of 4<sup>th</sup> February 2015) detected a weak conductor estimated to be located approximately 100 metres off the drillhole.

Two diamond drill holes are currently underway and both have so far intersected Nova-style hostrocks containing occasional patches of trace sulphide. Drilling is continuing.

These are the first of a 20-30 hole diamond drilling program designed to be a first pass reconnaissance of the Crux intrusion, which covers an area of 12 square kilometres.

## Mark Bennett, Managing Director and CEO

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## Competent Persons statement

The information in this report that relates to Exploration Results is based on information compiled by John Bartlett and Andrew Thompson who are employees of the company and fairly represents this information. Mr Bartlett and Mr Thompson are members of the Australasian Institute of Mining and Metallurgy. Mr Bartlett and Mr Thompson have sufficient experience of relevance to the styles of mineralisation and the 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. Mr Bartlett and Mr Thompson consent to the inclusion in this report of the matters based on information in the form and context in which it appears. Exploration results are based on standard industry practices, including sampling, assay methods, and appropriate quality assurance quality control (QAQC) measures. Reverse circulation (RC), aircore (AC) and rotary air blast (RAB) drilling samples are collected as composite samples of 4 or 2 metres and as 1 metre splits (stated in results). Mineralised intersections derived from composite samples are subsequently re-split to 1 metre samples to better define grade distribution. Core samples are taken as half NQ core or quarter HQ core and sampled to geological boundaries where appropriate. The quality of RC drilling samples is optimised by the use of riffle and/or cone splitters, dust collectors, logging of various criteria designed to record sample size, recovery and contamination, and use of field duplicates to measure sample representivity. For soil samples, PGM and gold assays are based on an aqua regia digest with Inductively Coupled Plasma (ICP) finish and base metal assays may be based on aqua regia or four acid digest with inductively coupled plasma optical emission spectrometry (ICPOES) or atomic absorption spectrometry (AAS) finish. In the case of reconnaissance RAB, AC, RC or rock chip samples, PGM and gold assays are based on lead or nickel sulphide collection fire assay digests with an ICP finish, base metal assays are based on a four acid digest and inductively coupled plasma optical emission spectrometry (ICPOES) and atomic absorption spectrometry (AAS) finish, and where appropriate, oxide metal elements such as Fe, Ti and Cr are based on a lithium borate fusion digest and X-ray fluorescence (XRF) finish. In the case of strongly mineralised samples, base metal assays are based on a special high precision four acid digest (a four acid digest using a larger volume of material) and an AAS finish using a dedicated calibration considered more accurate for higher concentrations. Sample preparation and analysis is undertaken at Minanalytical, Genalysis Intertek and Ultratrace laboratories in Perth, Western Australia. The quality of analytical results is monitored by the use of internal laboratory procedures and standards together with certified standards, duplicates and blanks and statistical analysis where appropriate to ensure that results are representative and within acceptable ranges of accuracy and precision. Where quoted, nickel-copper intersections are based on a minimum threshold grade of 0.5% Ni and/or Cu, and gold intersections are based on a minimum gold threshold grade of 0.1g/t Au unless otherwise stated. Intersections are length and density weighted where appropriate as per standard industry practice. All sample and drill hole co-ordinates are based on the GDA/MGA grid and datum unless otherwise stated. Exploration results obtained by other companies and quoted by Sirius have not necessarily been obtained using the same methods or subjected to the same QAQC protocols. These results may not have been independently verified because original samples and/or data may no longer be available.

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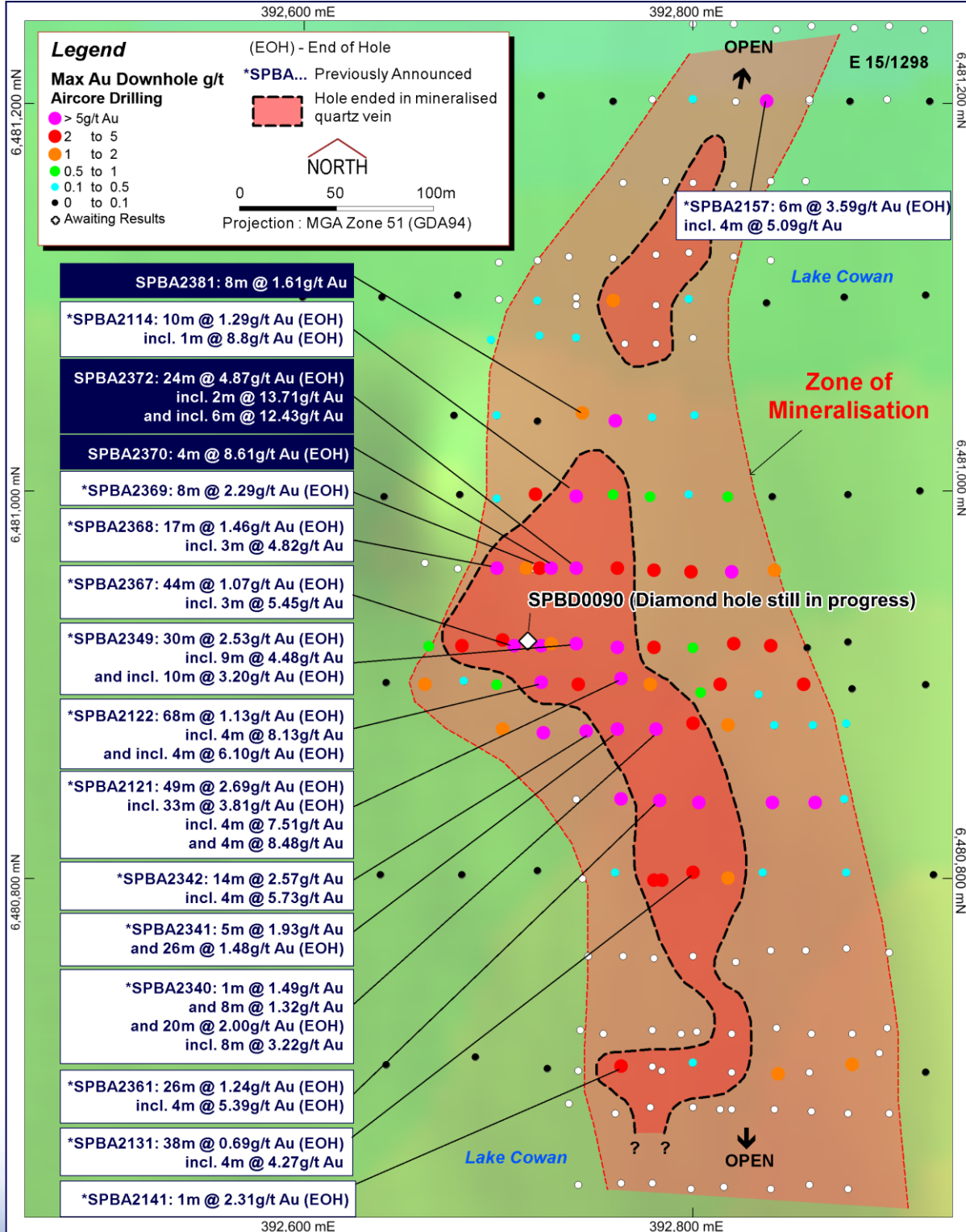


Figure 1. Drilling results at Baloo showing extent of gold and subjacent quartz veining, with many holes ending in gold mineralisation ("EOH") within quartz veins unable to be penetrated by the aircore rig.

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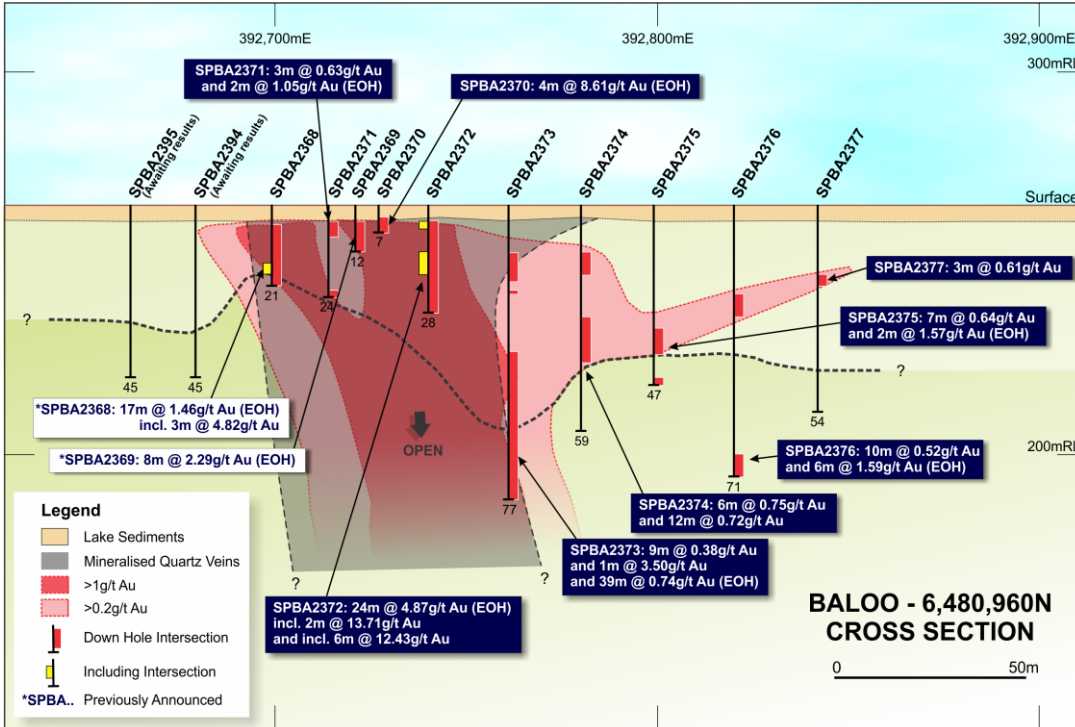


Figure 2. Cross section 6,480,960N – 60m north of discovery line.

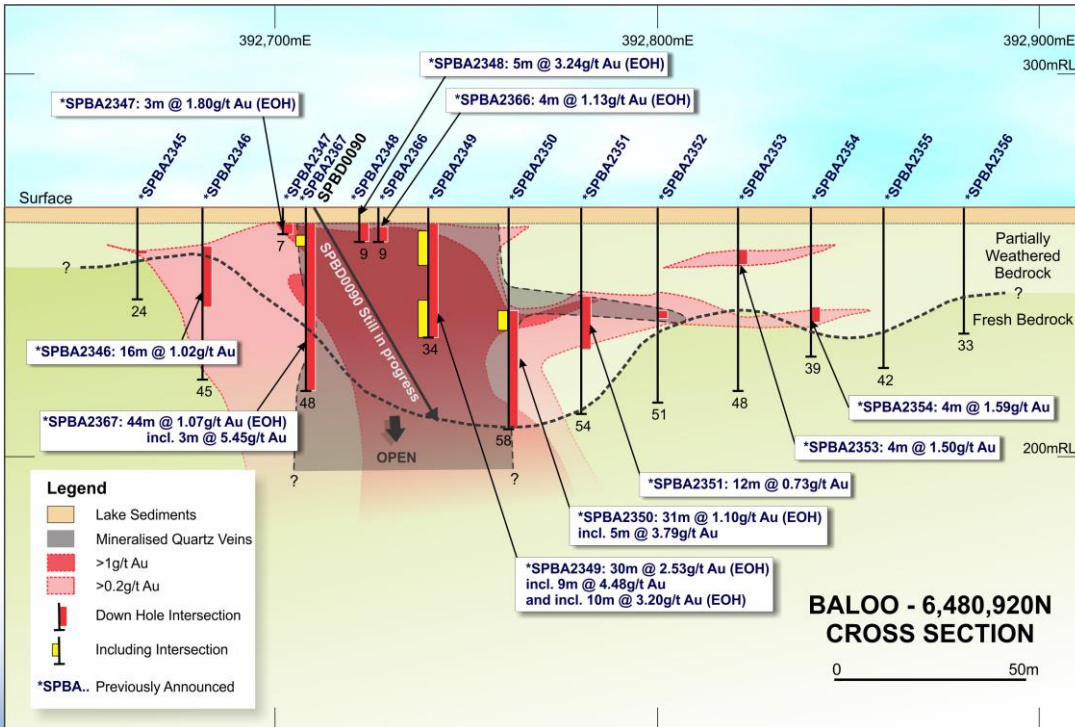


Figure 3. Cross section 6,480,920N, showing location and progress of first diamond drill hole.

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Figure 4. First core from diamond drill hole SPBD0090, showing quartz veins in oxide zone.

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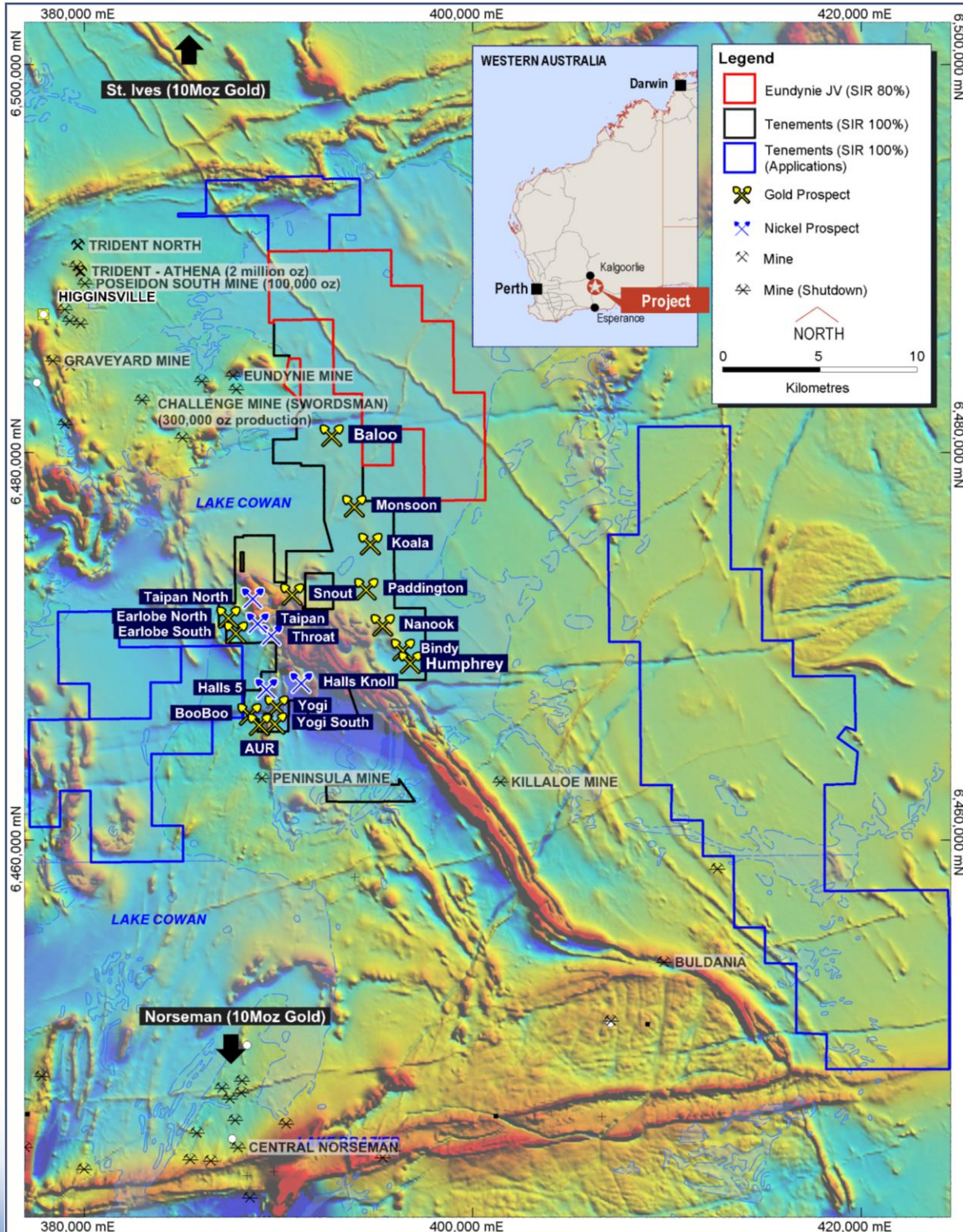
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Figure 5. First core from diamond drill hole SPBD0090, showing quartz veins in primary zone.

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## Annexure 1

Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBD0090	Baloo	65	6480920	392710	265	-60	090				AWR	In progress

Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA1350	Baloo	12	6481819	392600	265	-90	360				NSI	
SPBA1351	Baloo	9	6481779	392600	265	-90	360				NSI	
SPBA1352	Baloo	15	6481739	392598	265	-90	360				NSI	
SPBA1353	Baloo	12	6481697	392599	265	-90	360				NSI	
SPBA1354	Baloo	7	6481660	392599	265	-90	360				NSI	
SPBA1355	Baloo	4	6481621	392599	265	-90	360				NSI	
SPBA1356	Baloo	4	6481580	392600	265	-90	360				NSI	
SPBA1357	Baloo	4	6481539	392601	265	-90	360				NSI	
SPBA1358	Baloo	5	6481500	392599	265	-90	360				NSI	
SPBA1359	Baloo	10	6481460	392601	265	-90	360				NSI	
SPBA1360	Baloo	5	6481420	392601	265	-90	360				NSI	
SPBA1361	Baloo	4	6481380	392600	265	-90	360				NSI	
SPBA1362	Baloo	5	6481346	392601	265	-90	360				NSI	
SPBA1363	Baloo	5	6481301	392601	265	-90	360				NSI	
SPBA1364	Baloo	5	6481261	392601	265	-90	360				NSI	
SPBA1365	Baloo	4	6481217	392600	265	-90	360				NSI	
SPBA1366	Baloo	5	6481178	392600	265	-90	360				NSI	
SPBA1367	Baloo	4	6481141	392600	265	-90	360				NSI	
SPBA1368	Baloo	4	6481100	392599	265	-90	360				NSI	
SPBA1369	Baloo	4	6481058	392599	265	-90	360				NSI	
SPBA1370	Baloo	9	6481019	392598	265	-90	360				NSI	
SPBA1371	Baloo	28	6480979	392598	265	-90	360				NSI	
SPBA1372	Baloo	14	6481001	393002	265	-90	360				NSI	
SPBA1373	Baloo	13	6481000	392959	265	-90	360				NSI	
SPBA1374	Baloo	5	6481000	392917	265	-90	360				NSI	
SPBA1375	Baloo	43	6480998	392880	265	-90	360				NSI	
SPBA1376	Baloo	60	6480997	392841	265	-90	360				NSI	
SPBA1377	Baloo	91	6480998	392798	265	-90	360	90	91	1	0.4	
SPBA1378	Baloo	46	6480998	392759	265	-90	360	20	46	26	0.31	EOH
SPBA1379	Baloo	36	6480998	392719	265	-90	360	4	24	20	1.15	
SPBA1380	Baloo	36	6480998	392680	265	-90	360				NSI	

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Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA1381	Baloo	27	6480997	392641	265	-90	360				NSI	
SPBA1382	Baloo	5	6480999	392559	265	-90	360				NSI	
SPBA1383	Baloo	9	6480999	392518	265	-90	360				NSI	
SPBA1384	Baloo	5	6480999	392481	265	-90	360				NSI	
SPBA1385	Baloo	15	6480999	392441	265	-90	360				NSI	
SPBA1386	Baloo	12	6480999	392400	265	-90	360				NSI	
SPBA1387	Baloo	34	6480999	392361	265	-90	360				NSI	
SPBA1388	Baloo	18	6481000	392319	265	-90	360				NSI	
SPBA1389	Baloo	24	6481000	392279	265	-90	360	16	24	8	0.24	
SPBA1390	Baloo	26	6481002	392242	265	-90	360				NSI	
SPBA1391	Baloo	33	6481003	392201	265	-90	360				NSI	
SPBA1392	Baloo	22	6481003	392161	265	-90	360				NSI	
SPBA1393	Baloo	30	6481005	392125	265	-90	360				NSI	
SPBA1394	Baloo	23	6481005	392079	265	-90	360				NSI	
SPBA1395	Baloo	41	6481004	392039	265	-90	360				NSI	
SPBA1396	Baloo	45	6481003	392000	265	-90	360				NSI	
SPBA1397	Baloo	24	6481004	391962	265	-90	360				NSI	
SPBA1398	Baloo	42	6481001	391919	265	-90	360				NSI	
SPBA1399	Baloo	54	6481003	391881	265	-90	360				NSI	
SPBA1400	Baloo	36	6481003	391840	265	-90	360				NSI	
SPBA1401	Baloo	39	6481003	391798	265	-90	360				NSI	
SPBA1402	Baloo	45	6481000	391761	265	-90	360				NSI	
SPBA1403	Baloo	24	6481002	391723	265	-90	360				NSI	
SPBA1404	Baloo	27	6481002	391682	265	-90	360				NSI	
SPBA1405	Baloo	42	6481001	391601	265	-90	360				NSI	
SPBA1406	Baloo	12	6480999	391520	265	-90	360				NSI	
SPBA1407	Baloo	8	6480999	391440	265	-90	360				NSI	
SPBA1408	Baloo	5	6480999	391360	265	-90	360				NSI	
SPBA1409	Baloo	6	6481000	391280	265	-90	360				NSI	
SPBA1410	Baloo	11	6481000	391203	265	-90	360				NSI	
SPBA1411	Baloo	2	6481459	392101	265	-90	360				NSI	
SPBA1412	Baloo	5	6481422	392101	265	-90	360				NSI	
SPBA1413	Baloo	3	6481380	392100	265	-90	360				NSI	
SPBA1414	Baloo	4	6481343	392101	265	-90	360				NSI	
SPBA1415	Baloo	4	6481300	392099	265	-90	360				NSI	
SPBA1416	Baloo	5	6481260	392099	265	-90	360				NSI	
SPBA1417	Baloo	6	6481219	392099	265	-90	360				NSI	
SPBA1418	Baloo	11	6481180	392100	265	-90	360				NSI	

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Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA1419	Baloo	9	6481141	392100	265	-90	360				NSI	
SPBA1420	Baloo	11	6481100	392104	265	-90	360				NSI	
SPBA1421	Baloo	24	6481057	392101	265	-90	360				NSI	
SPBA1422	Baloo	4	6481259	392399	265	-90	360				NSI	
SPBA1423	Baloo	4	6481299	392400	265	-90	360				NSI	
SPBA1424	Baloo	4	6481338	392399	265	-90	360				NSI	
SPBA1425	Baloo	4	6481379	392399	265	-90	360				NSI	
SPBA1426	Baloo	6	6481418	392399	265	-90	360				NSI	
SPBA1427	Baloo	5	6481458	392399	265	-90	360				NSI	
SPBA1428	Baloo	3	6481499	392398	265	-90	360				NSI	
SPBA1429	Baloo	3	6481544	392397	265	-90	360				NSI	
SPBA1430	Baloo	3	6481581	392398	265	-90	360				NSI	
SPBA1431	Baloo	4	6481618	392398	265	-90	360				NSI	
SPBA1432	Baloo	8	6481659	392397	265	-90	360				NSI	
SPBA1433	Baloo	5	6481697	392396	265	-90	360				NSI	
SPBA2113	Baloo	42	6480996	392699	265	-90	360	4	8	4	0.25	
SPBA2114	Baloo	26	6480997	392740	265	-90	360	16	26	10	1.29	EOH
including								25	26	1	8.8	EOH
SPBA2115	Baloo	82	6480997	392778	265	-90	360	8	12	4	0.14	
and								52	64	12	0.43	
and								68	72	4	0.26	
and								81	82	1	0.23	EOH
SPBA2116	Baloo	70	6480997	392818	265	-90	360	28	36	8	0.52	
including								28	32	4	0.89	
and								52	56	4	0.18	
and								69	70	1	0.21	EOH
SPBA2117	Baloo	48	6480900	392920	265	-90	360				NSI	
SPBA2118	Baloo	30	6480898	392882	265	-90	360				NSI	
SPBA2119	Baloo	48	6480895	392834	265	-90	360	16	24	8	0.28	
SPBA2120	Baloo	84	6480896	392804	265	-90	360	20	28	8	0.45	
including								20	24	4	0.54	
and								32	48	16	0.21	
and								83	84	1	0.2	
SPBA2121	Baloo	57	6480903	392763	265	-90	360	8	57	49	2.69	EOH
including								24	57	33	3.81	EOH
including								28	32	4	7.51	
and including								48	52	4	8.48	
SPBA2122	Baloo	72	6480901	392722	265	-90	360	4	72	68	1.13	EOH

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Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
including								4	8	4	8.13	
and including								68	72	4	6.1	EOH
SPBA2123	Baloo	56	6480902	392682	265	-90	360	4	8	4	0.41	
SPBA2124	Baloo	39	6480901	392642	265	-90	360				NSI	
SPBA2125	Baloo	30	6480905	392603	265	-90	360				NSI	
SPBA2126	Baloo	24	6480801	392598	265	-90	360				NSI	
SPBA2127	Baloo	15	6480802	392639	265	-90	360				NSI	
SPBA2128	Baloo	18	6480802	392681	265	-90	360				NSI	
SPBA2129	Baloo	21	6480804	392720	265	-90	360				NSI	
SPBA2130	Baloo	30	6480803	392760	265	-90	360	8	12	4	0.34	
SPBA2131	Baloo	54	6480803	392800	265	-90	360	16	54	38	0.69	EOH
including								40	44	4	4.27	
SPBA2132	Baloo	22	6480803	392836	265	-90	360	12	16	4	0.17	
and								20	22	2	0.23	
SPBA2133	Baloo	23	6480803	392879	265	-90	360	21	23	2	0.19	
SPBA2134	Baloo	7	6480802	392924	265	-90	360				NSI	
SPBA2135	Baloo	23	6480700	392920	265	-90	360				NSI	
SPBA2136	Baloo	32	6480701	392961	265	-90	360				NSI	
SPBA2137	Baloo	34	6480702	392999	265	-90	360				NSI	
SPBA2138	Baloo	35	6480704	392882	265	-90	360	16	28	12	1.04	
SPBA2139	Baloo	51	6480699	392844	265	-90	360	28	44	16	0.9	
SPBA2140	Baloo	16	6480705	392800	265	-90	360	15	16	1	0.1	
SPBA2141	Baloo	5	6480703	392763	265	-90	360	4	5	1	2.31	EOH
SPBA2142	Baloo	18	6480702	392725	265	-90	360				NSI	
SPBA2143	Baloo	15	6480708	392688	265	-90	360				NSI	
SPBA2144	Baloo	12	6480704	392642	265	-90	360				NSI	
SPBA2145	Baloo	4	6481100	392640	265	-90	360				NSI	
SPBA2146	Baloo	11	6481101	392679	265	-90	360				NSI	
SPBA2147	Baloo	14	6481098	392720	265	-90	360	8	14	6	0.14	
SPBA2148	Baloo	31	6481098	392759	265	-90	360	4	8	4	0.21	
and								28	31	3	0.60	EOH
SPBA2149	Baloo	65	6481099	392798	265	-90	360	8	12	4	0.16	
SPBA2150	Baloo	4	6481097	392838	265	-90	360					
SPBA2151	Baloo	36	6481100	392878	265	-90	360				NSI	
SPBA2152	Baloo	18	6481101	392920	265	-90	360				NSI	
SPBA2153	Baloo	21	6481103	392961	265	-90	360	8	12	4	0.24	
SPBA2154	Baloo	32	6481201	392960	265	-90	360					
SPBA2155	Baloo	23	6481201	392922	265	-90	360					

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Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA2156	Baloo	36	6481201	392881	265	-90	360					
SPBA2157	Baloo	74	6481201	392838	265	-90	360	68	74	6	3.59	EOH
including								68	72	4	5.09	
SPBA2158	Baloo	57	6481202	392800	265	-90	360	48	57	9	0.16	
SPBA2159	Baloo	15	6481201	392759	265	-90	360				NSI	
SPBA2160	Baloo	6	6481204	392722	265	-90	360				NSI	
SPBA2161	Baloo	4	6481204	392678	265	-90	360				NSI	
SPBA2162	Baloo	5	6481207	392640	265	-90	360				NSI	
SPBA2329	Baloo	42	6480900	392662	265	-90	360	5	10	5	0.40	
SPBA2330	Baloo	42	6480900	392699	265	-90	360	5	10	5	0.37	
SPBA2331	Baloo	19	6480900	392741	265	-90	360	5	19	14	0.82	EOH
SPBA2332	Baloo	31	6480900	392778	265	-90	360	24	31	7	0.41	EOH
SPBA2333	Baloo	51	6480900	392814	265	-90	360	20	51	31	0.69	EOH
SPBA2334	Baloo	49	6480900	392857	265	-90	360	12	13	1	4.33	
SPBA2335	Baloo	36	6480880	392879	265	-90	360				NSI	
SPBA2336	Baloo	42	6480879	392862	265	-90	360				NSI	
SPBA2337	Baloo	45	6480879	392842	265	-90	360				NSI	
SPBA2338	Baloo	42	6480879	392818	265	-90	360	19	24	5	0.82	
SPBA2339	Baloo	65	6480880	392800	265	-90	360	21	27	6	1.33	
SPBA2340	Baloo	78	6480877	392781	265	-90	360	24	25	1	1.49	
and								42	50	8	1.32	
and								59	79	20	2.00	EOH
SPBA2341	Baloo	42	6480877	392761	265	-90	360	4	9	5	1.93	
and								16	42	26	1.48	EOH
SPBA2342	Baloo	33	6480876	392745	265	-90	360	4	18	14	2.57	
SPBA2343	Baloo	36	6480875	392723	265	-90	360	4	8	4	1.86	
SPBA2344	Baloo	51	6480877	392702	265	-90	360	7	8	1	1.85	
SPBA2345	Baloo	24	6480920	392664	265	-90	360	11	12	1	0.81	
SPBA2346	Baloo	45	6480920	392681	265	-90	360	10	26	16	1.02	
SPBA2347	Baloo	7	6480923	392702	265	-90	360	4	7	3	1.80	EOH
SPBA2348	Baloo	9	6480920	392722	265	-90	360	4	9	5	3.24	EOH
SPBA2349	Baloo	34	6480921	392740	265	-90	360	4	34	30	2.53	EOH
including								6	15	9	4.48	
and including								24	34	10	3.20	EOH
SPBA2350	Baloo	58	6480919	392761	265	-90	360	27	58	31	1.10	EOH
including								Baloo	32	5	3.79	
SPBA2351	Baloo	54	6480919	392780	265	-90	360	24	36	12	0.73	
SPBA2352	Baloo	51	6480919	392800	265	-90	360	27	29	2	0.66	

# ASX Announcement

Monday 16<sup>th</sup> February 2015



Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA2353	Baloo	48	6480921	392821	265	-90	360	11	15	4	1.50	
SPBA2354	Baloo	39	6480920	392840	265	-90	360	27	31	4	1.59	
SPBA2355	Baloo	42	6480919	392859	265	-90	360	-	-	-	NSI	
SPBA2356	Baloo	33	6480922	392880	265	-90	360	-	-	-	NSI	
SPBA2357	Baloo	22	6480841	392878	265	-90	360	-	-	-	NSI	
SPBA2358	Baloo	23	6480839	392863	265	-90	360	15	18	3	3.07	
SPBA2359	Baloo	15	6480839	392841	265	-90	360	4	9	5	1.47	
SPBA2360	Baloo	36	6480839	392803	265	-90	360	14	23	9	1.32	
including								14	15	1	8.02	
and								33	36	3	1.81	EOH
SPBA2361	Baloo	48	6480840	392783	265	-90	360	22	48	26	1.24	EOH
including								44	48	4	5.39	EOH
SPBA2362	Baloo	45	6480841	392763	265	-90	360	14	19	5	1.54	
and								42	45	3	0.87	EOH
SPBA2363	Baloo	23	6480799	392780	265	-90	360	8	12	4	0.67	
and								21	23	2	2.56	EOH
SPBA2364	Baloo	57	6480799	392784	265	-90	360	24	48	24	0.51	
SPBA2365	Baloo	41	6480800	392818	265	-90	360	15	23	8	0.91	
and								34	36	2	0.66	
SPBA2366	Baloo	9	6480921	392727	265	-90	360	5	9	4	1.13	EOH
SPBA2367	Baloo	48	6480920	392708	265	-90	360	4	48	44	1.07	EOH
including								7	10	3	5.45	
SPBA2368	Baloo	21	6480960	392699	265	-90	360	4	21	17	1.46	EOH
including								15	18	3	4.82	
SPBA2369	Baloo	12	6480960	392718	265	-90	360	4	12	8	2.29	EOH
<b>SPBA2370</b>	<b>Baloo</b>	<b>7</b>	<b>6480960</b>	<b>392726</b>	<b>265</b>	<b>-90</b>	<b>360</b>	<b>3</b>	<b>7</b>	<b>4</b>	<b>8.61</b>	<b>EOH</b>
<b>SPBA2371</b>	<b>Baloo</b>	<b>24</b>	<b>6480961</b>	<b>392719</b>	<b>265</b>	<b>-90</b>	<b>360</b>	<b>4</b>	<b>7</b>	<b>3</b>	<b>0.63</b>	
and								19	21	2	1.05	EOH
SPBA2372	Baloo	28	6480960	392740	265	-90	360	4	28	24	4.87	EOH
including								4	6	2	13.71	
and including								12	18	6	12.43	
SPBA2373	Baloo	77	6480960	392761	265	-90	360	8	17	9	0.38	
and								22	23	1	3.5	
and								38	77	39	0.74	EOH
SPBA2374	Baloo	59	6480959	392780	265	-90	360	12	18	6	0.75	
								31	43	12	0.72	
SPBA2375	Baloo	47	6480958	392799	265	-90	360	32	39	7	0.64	
and								45	47	2	1.57	

# ASX Announcement

Monday 16<sup>th</sup> February 2015



Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA2376	Baloo	71	6480958	392820	265	-90	360	24	34	10	0.52	
								65	71	6	1.59	EOH
SPBA2377	Baloo	54	6480959	392842	265	-90	360	18	21	3	0.61	
SPBA2378	Baloo	74	6481039	392801	265	-90	360				NSI	
SPBA2379	Baloo	54	6481038	392779	265	-90	360				NSI	
SPBA2380	Baloo	57	6481036	392760	265	-90	360	4	14	10	0.63	
SPBA2381	Baloo	45	6481040	392743	265	-90	360	19	27	8	1.61	
SPBA2382	Baloo	34	6481036	392720	265	-90	360				NSI	
SPBA2383	Baloo	24	6481039	392699	265	-90	360				NSI	
SPBA2384	Baloo	19	6481039	392677	265	-90	360				NSI	
SPBA2385	Baloo	9	6481078	392696	265	-90	360				NSI	
SPBA2386	Baloo	25	6481080	392721	265	-90	360				NSI	
SPBA2387	Baloo	31	6481079	392740	265	-90	360				NSI	
SPBA2388	Baloo	39	6481076	392765	265	-90	360				AWR	
SPBA2389	Baloo	54	6481076	392781	265	-90	360				AWR	
SPBA2390	Baloo	71	6481079	392800	265	-90	360				AWR	
SPBA2391	Baloo	45	6481096	392740	265	-90	360				AWR	
SPBA2392	Baloo	27	6481100	392740	265	-90	360				AWR	
SPBA2393	Baloo	5	6481099	392700	265	-90	360				AWR	
SPBA2394	Baloo	45	6480960	392679	265	-90	360				AWR	
SPBA2395	Baloo	45	6480963	392662	265	-90	360				AWR	
SPBA2396	Baloo	51	6480841	392740	265	-90	360				AWR	
SPBA2397	Baloo	45	6480800	392743	265	-90	360				AWR	
SPBA2398	Baloo	9	6480762	392901	265	-90	360				AWR	
SPBA2399	Baloo	20	6480764	392879	265	-90	360				AWR	
SPBA2400	Baloo	36	6480763	392858	265	-90	360				AWR	
SPBA2401	Baloo	38	6480763	392840	265	-90	360				AWR	
SPBA2402	Baloo	55	6480757	392822	265	-90	360				AWR	
SPBA2403	Baloo	63	6480760	392800	265	-90	360				AWR	
SPBA2404	Baloo	31	6480759	392780	265	-90	360				AWR	
SPBA2405	Baloo	29	6480760	392764	265	-90	360				AWR	
SPBA2406	Baloo	42	6480760	392746	265	-90	360				AWR	
SPBA2407	Baloo	25	6480723	392900	265	-90	360				AWR	
SPBA2408	Baloo	28	6480720	392882	265	-90	360				AWR	
SPBA2409	Baloo	39	6480720	392861	265	-90	360				AWR	
SPBA2410	Baloo	50	6480723	392843	265	-90	360				AWR	
SPBA2411	Baloo	39	6480720	392820	265	-90	360				AWR	
SPBA2412	Baloo	37	6480721	392802	265	-90	360				AWR	

# ASX Announcement

Monday 16<sup>th</sup> February 2015



Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA2413	Baloo	29	6480720	392794	265	-90	360				AWR	
SPBA2414	Baloo	20	6480722	392779	265	-90	360				AWR	
SPBA2415	Baloo	30	6480720	392754	265	-90	360				AWR	
SPBA2416	Baloo	30	6480722	392742	265	-90	360				AWR	
SPBA2417	Baloo	36	6480701	392741	265	-90	360				AWR	
SPBA2418	Baloo	28	6480703	392779	265	-90	360				AWR	
SPBA2419	Baloo	56	6480701	392784	265	-90	360				AWR	
SPBA2420	Baloo	38	6480700	392820	265	-90	360				AWR	
SPBA2421	Baloo	42	6480700	392860	265	-90	360				AWR	
SPBA2422	Baloo	30	6480710	392896	265	-90	360				AWR	
SPBA2423	Baloo	29	6480679	392901	265	-90	360				AWR	
SPBA2424	Baloo	37	6480679	392880	265	-90	360				AWR	
SPBA2425	Baloo	49	6480680	392861	265	-90	360				AWR	
SPBA2426	Baloo	63	6480681	392842	265	-90	360				AWR	
SPBA2427	Baloo	24	6480681	392820	265	-90	360				AWR	
SPBA2428	Baloo	45	6480681	392814	265	-90	360				AWR	
SPBA2429	Baloo	36	6480682	392800	265	-90	360				AWR	
SPBA2430	Baloo	28	6480682	392778	265	-90	360				AWR	
SPBA2431	Baloo	30	6480679	392760	265	-90	360				AWR	
SPBA2432	Baloo	36	6480684	392736	265	-90	360				AWR	
SPBA2433	Baloo	5	6481118	392700	265	-90	360				AWR	
SPBA2434	Baloo	14	6481119	392720	265	-90	360				AWR	
SPBA2435	Baloo	24	6481121	392736	265	-90	360				AWR	
SPBA2436	Baloo	35	6481120	392759	265	-90	360				AWR	
SPBA2437	Baloo	42	6481122	392781	265	-90	360				AWR	
SPBA2438	Baloo	78	6481123	392798	265	-90	360				AWR	
SPBA2439	Baloo	78	6481121	392821	265	-90	360				AWR	
SPBA2440	Baloo	42	6481160	392858	265	-90	360				AWR	
SPBA2441	Baloo	64	6481160	392840	265	-90	360				AWR	
SPBA2442	Baloo	84	6481158	392821	265	-90	360				AWR	
SPBA2443	Baloo	56	6481159	392800	265	-90	360				AWR	
SPBA2444	Baloo	37	6481160	392786	265	-90	360				AWR	
SPBA2445	Baloo	19	6481159	392764	265	-90	360				AWR	
SPBA2446	Baloo	29	6481202	392779	265	-90	360				AWR	
SPBA2447	Baloo	78	6481201	392822	265	-90	360				AWR	
SPBA2448	Baloo	53	6481201	392860	265	-90	360				AWR	
SPBA2449	Baloo	30	6481202	392900	265	-90	360				AWR	
SPBA2450	Baloo	23	6481238	392919	265	-90	360				AWR	



# ASX Announcement

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Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA2451	Baloo	23	6481240	392901	265	-90	360				AWR	
SPBA2452	Baloo	31	6481239	392883	265	-90	360				AWR	
SPBA2453	Baloo	33	6481240	392861	265	-90	360				AWR	
SPBA2454	Baloo	57	6481238	392843	265	-90	360				AWR	
SPBA2455	Baloo	99	6481241	392821	265	-90	360				AWR	
SPBA2456	Baloo	72	6481241	392800	265	-90	360				AWR	
SPBA2457	Baloo	78	6481279	392800	265	-90	360				AWR	
SPBA2458	Baloo	78	6481280	392819	265	-90	360				AWR	
SPBA2459	Baloo	48	6481279	392839	265	-90	360				AWR	
SPBA2460	Baloo	45	6481279	392860	265	-90	360				AWR	
SPBA2461	Baloo	20	6481281	392880	265	-90	360				AWR	
SPBA2462	Baloo	27	6481283	392900	265	-90	360				AWR	
SPBA2463	Baloo	36	6481280	392920	265	-90	360				AWR	
SPBA2464	Baloo	33	6481280	392938	265	-90	360				AWR	
SPBA2465	Baloo	34	6481119	392840	265	-90	360				AWR	
SPBA2466	Baloo	41	6480640	392880	265	-90	360				AWR	
SPBA2467	Baloo	60	6480642	392860	265	-90	360				AWR	
SPBA2468	Baloo	57	6480640	392840	265	-90	360				AWR	
SPBA2469	Baloo	45	6480641	392816	265	-90	360				AWR	
SPBA2470	Baloo	43	6480640	392799	265	-90	360				AWR	
SPBA2471	Baloo	51	6480643	392779	265	-90	360				AWR	
SPBA2472	Baloo	36	6480643	392763	265	-90	360				AWR	
SPBA2473	Baloo	30	6480642	392741	265	-90	360				AWR	
SPBA2474	Baloo	31	6480602	392899	265	-90	360				AWR	
SPBA2475	Baloo	26	6480602	392881	265	-90	360				AWR	
SPBA2476	Baloo	45	6480600	392861	265	-90	360				AWR	
SPBA2477	Baloo	41	6480600	392841	265	-90	360				AWR	
SPBA2478	Baloo	39	6480598	392821	265	-90	360				AWR	
SPBA2479	Baloo	42	6480601	392795	265	-90	360				AWR	
SPBA2480	Baloo	39	6480601	392776	265	-90	360				AWR	
SPBA2481	Baloo	35	6480599	392758	265	-90	360				AWR	
SPBA2482	Baloo	37	6480519	392979	265	-90	360				AWR	
SPBA2483	Baloo	27	6480521	392961	265	-90	360				AWR	
SPBA2484	Baloo	17	6480519	392939	265	-90	360				AWR	
SPBA2485	Baloo	16	6480518	392920	265	-90	360				AWR	
SPBA2486	Baloo	16	6480521	392901	265	-90	360				AWR	
SPBA2487	Baloo	18	6480521	392874	265	-90	360				AWR	
SPBA2488	Baloo	39	6480517	392858	265	-90	360				AWR	
SPBA2489	Baloo	39	6480520	392840	265	-90	360				AWR	

# ASX Announcement

Monday 16<sup>th</sup> February 2015



Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA2490	Baloo	66	6480520	392820	265	-90	360				AWR	
SPBA2491	Baloo	32	6480520	392803	265	-90	360				AWR	
SPBA2492	Baloo	30	6480519	392776	265	-90	360				AWR	
SPBA2493	Baloo	10	6480442	393021	265	-90	360				AWR	
SPBA2494	Baloo	33	6480443	393003	265	-90	360				AWR	
SPBA2495	Baloo	24	6480444	392982	265	-90	360				AWR	
SPBA2496	Baloo	24	6480442	392961	265	-90	360				AWR	
SPBA2497	Baloo	14	6480443	392942	265	-90	360				AWR	
SPBA2498	Baloo	28	6480444	392923	265	-90	360				AWR	
SPBA2499	Baloo	15	6480442	392902	265	-90	360				AWR	
SPBA2500	Baloo	18	6480444	392880	265	-90	360				AWR	
SPBA2501	Baloo	31	6480444	392862	265	-90	360				AWR	
SPBA2502	Baloo	38	6480442	392841	265	-90	360				AWR	
SPBA2503	Baloo	48	6480439	392823	265	-90	360				AWR	
SPBA2504	Baloo	44	6480441	392800	265	-90	360				AWR	
SPBA2505	Baloo	39	6480441	392782	265	-90	360				AWR	
SPBA2506	Baloo	30	6480443	392763	265	-90	360				AWR	
SPBA2507	Baloo	39	6480356	392764	265	-90	360				AWR	
SPBA2508	Baloo	30	6480359	392782	265	-90	360				AWR	
SPBA2509	Baloo	37	6480359	392800	265	-90	360				AWR	
SPBA2510	Baloo	37	6480359	392821	265	-90	360				AWR	
SPBA2511	Baloo	35	6480360	392838	265	-90	360				AWR	
SPBA2512	Baloo	23	6480358	392859	265	-90	360				AWR	
SPBA2513	Baloo	16	6480358	392878	265	-90	360				AWR	
SPBA2514	Baloo	13	6480358	392898	265	-90	360				AWR	
SPBA2515	Baloo	16	6480359	392921	265	-90	360				AWR	
SPBA2516	Baloo	30	6480358	392958	265	-90	360				AWR	
SPBA2517	Baloo	22	6480360	392935	265	-90	360				AWR	
SPBA2518	Baloo	10	6480360	392980	265	-90	360				AWR	
SPBA2519	Baloo	37	6480359	393000	265	-90	360				AWR	
SPBA2520	Baloo	30	6480360	393020	265	-90	360				AWR	
SPBA2521	Baloo	50	6480360	393063	265	-90	360				AWR	
SPBA2522	Baloo	19	6480277	393095	265	-90	360				AWR	
SPBA2523	Baloo	49	6480279	393081	265	-90	360				AWR	
SPBA2524	Baloo	51	6480280	393061	265	-90	360				AWR	
SPBA2525	Baloo	46	6480281	393038	265	-90	360				AWR	
SPBA2526	Baloo	42	6480280	393021	265	-90	360				AWR	
SPBA2527	Baloo	41	6480281	392999	265	-90	360				AWR	
SPBA2528	Baloo	41	6480281	392979	265	-90	360				AWR	
SPBA2529	Baloo	31	6480282	392959	265	-90	360				AWR	

# ASX Announcement

Monday 16<sup>th</sup> February 2015



Hole No.	Zone	Total Depth	North	East	RL	Dip	Azim	From, m	To, m	Width, m	Au g/t	Comment
SPBA2530	Baloo	23	6480283	392940	265	-90	360				AWR	
SPBA2531	Baloo	18	6480281	392920	265	-90	360				AWR	
SPBA2532	Baloo	21	6480280	392890	265	-90	360				AWR	
SPBA2533	Baloo	18	6480284	392879	265	-90	360				AWR	
SPBA2534	Baloo	30	6480281	392860	265	-90	360				AWR	
SPBA2535	Baloo	34	6480281	392841	265	-90	360				AWR	
SPBA2536	Baloo	13	6480279	392819	265	-90	360				AWR	
SPBA2537	Baloo	45	6480281	392800	265	-90	360				AWR	
SPBA2538	Baloo	32	6480278	392779	265	-90	360				AWR	
SPBA2539	Baloo	36	6480278	392756	265	-90	360				AWR	
SPBA2540	Baloo	39	6480278	392741	265	-90	360				AWR	
SPBA2541	Baloo	17	6480840	392821	265	-90	360				AWR	
SPBA2542	Baloo	40	6481358	393023	265	-90	360				AWR	
SPBA2543	Baloo	25	6481360	393001	265	-90	360				AWR	
SPBA2544	Baloo	39	6481361	392980	265	-90	360				AWR	
SPBA2545	Baloo	48	6481361	392961	265	-90	360				AWR	
SPBA2546	Baloo	21	6481360	392940	265	-90	360				AWR	
SPBA2547	Baloo	30	6481361	392921	265	-90	360				AWR	
SPBA2548	Baloo	24	6481359	392904	265	-90	360				AWR	
SPBA2549	Baloo	40	6481358	392879	265	-90	360				AWR	
SPBA2550	Baloo	28	6481357	392863	265	-90	360				AWR	
SPBA2551	Baloo	39	6481358	392842	265	-90	360				AWR	
SPBA2552	Baloo	46	6481358	392824	265	-90	360				AWR	
SPBA2553	Baloo	40	6481359	392804	265	-90	360				AWR	

**BOLD** – signifies new assay results

NSI – No significant Intersection

EOH – End of hole

## SECTION 1 SAMPLING TECHNIQUES AND DATA

Criteria	JORC Code explanation	Commentary
Sampling techniques	<i>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.</i>	The mineralised trend is sampled by aircore drilling on a nominal 40 m hole spacing and 100 m line. A total of 343 aircore holes have been drilled to an average depth of 32 m for a total of 10,900m. Infill AC drilling has been conducted where warranted at a 40m x 20m spacing. Aircore holes are drilled vertically to refusal. Extensional drilling is being conducted at 80mm x 20m

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	<i>Include reference to measures taken to ensure sample representivity and the appropriate calibration of any measurement tools or systems used</i>	The drillhole locations are picked up by handheld GPS. Sampling was carried out under Sirius protocols and QAQC procedures as per industry best practice.
	<i>Aspects of the determination of mineralisation that are Material to the Public Report. 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</i>	Reconnaissance aircore samples are composited at 4 m to produce a bulk 3 kg sample. Samples were crushed, dried, pulverised (total prep), and split to produce a 25 g sub sample which is analysed using aqua-regia digestion with ICP-MS finish with a 1 ppb detection limit. Infill Aircore is sampled at 1m intervals with the same total prep and then fire assays using a 50g charge.
<b>Drilling techniques</b>	<i>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).</i>	Aircore drilling currently accounts for 100% of Sirius' current drilling at the Baloo prospect. Diamond drilling has been initiated and will augment the Aircore drilling with oxide triple tube holes and deeper holes into fresh primary material.
<b>Drill sample recovery</b>	<i>Method of recording and assessing core and chip sample recoveries and results assessed</i>	Aircore recoveries are logged visually as a percentage.
	<i>Measures taken to maximise sample recovery and ensure representative nature of the samples</i>	Drill cyclone and sample buckets are cleaned between rod-changes and after each hole to minimise down hole and/or cross-hole contamination.
	<i>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.</i>	Aircore drilling samples were occasionally wet which may have resulted in sample bias due to preferential loss/gain of fine/coarse material. Further diamond drilling will need to be undertaken to evaluate these effects.
<b>Logging</b>	<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>	The initial 4m composited sampling is not appropriate for mineral resource estimation and is considered a qualitative sampling technique. Infill aircore has been logged and sampled at 1m intervals downhole and is being assessed for suitability as part of a Resource Estimation Diamond triple tube drilling will be conducted in the oxide to determine whether the infill aircore samples are appropriate for mineral resource estimation.
	<i>Whether logging is qualitative or quantitative in nature. Core (or costean, channel, etc) photography.</i>	Logging of aircore records lithology, mineralogy, mineralisation, weathering, colour and other features of the samples.
	<i>The total length and percentage of the relevant intersections logged</i>	All drillholes were logged in full.
<b>Sub-sampling techniques and sample preparation</b>	<i>If core, whether cut or sawn and whether quarter, half or all core taken.</i>	N/A
	<i>If non-core, whether riffled, tube sampled, rotary split, etc and whether sampled wet or dry.</i>	Aircore chips are sampled by scoop. Samples were collected both wet and dry.

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	<i>For all sample types, the nature, quality and appropriateness of the sample preparation technique.</i>	The sample preparation of aircore follows industry best practice in sample preparation. All samples are pulverised utilising Essa LM1, LM2 or LM5 grinding mills determined by the size of the sample. Samples are dried, crushed as required and pulverized to produce a homogenous representative sub-sample for analysis. A grind quality target of 85% passing 75µm has been established and is relative to sample size, type and hardness.
	<i>Quality control procedures adopted for all sub-sampling stages to maximise representivity of samples.</i>	Reconnaissance aircore samples are collected at 1 m intervals and composited into 4 m samples using a scoop to sample individual metre samples. Certified Reference Materials (CRM's) and/or in house controls, blanks, splits and replicates are analysed with each batch of samples. These quality control results are reported along with the sample values in the final report. Selected samples are also re-analysed to confirm anomalous results. Infill aircore is collected as 1m samples with regular field duplicates and CRM inserted every 15 samples
	<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>	Field duplicates are taken at regular intervals. Samples are selected to weigh less than 3kg to ensure total preparation at the pulverisation stage.
	<i>Whether sample sizes are appropriate to the grain size of the material being sampled.</i>	Sample sizes are considered appropriate to give an accurate indication of mineralisation given the qualitative nature of the technique.
<b>Quality of assay data and laboratory tests</b>	<i>The nature, quality and appropriateness of the assaying and laboratory procedures used and whether the technique is considered partial or total.</i>	The analytical technique used a 25g aqua-regia digestion with ICP-MS finish for gold only. The method gives a near total digestion of the regolith intercepted in aircore drilling. This method is appropriate to detect anomalous gold mineralisation. Infill 1m samples and samples greater than 1 g/t are re-assayed using 50 g fire-assay with AAS finish which gives total digestion and is more appropriate for high-level samples.
	<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>	No geophysical tools were used to determine any element concentrations used in this resource estimate.
	<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>	Sample preparation checks for fineness were carried out by the laboratory as part of their internal procedures to ensure the grind size of 85% passing 75 micron was being attained. Laboratory QAQC involves the use of internal lab standards using certified reference material, blanks, splits and replicates as part of the in house procedures.
<b>Verification of sampling and assaying</b>	<i>The verification of significant intersections by either independent or alternative company personnel.</i>	Both the Managing and the Exploration Manager of Sirius has visually verified significant intersections in aircore drilling.
	<i>The use of twinned holes.</i>	No twin holes have been drilled at Baloo to date.
	<i>Documentation of primary data, data entry procedures, data verification, data storage (physical and electronic) protocols.</i>	Primary data was collected using a set of standard Excel templates using lookup codes. The information was sent to an external database consultant for validation and compilation into an onsite SQL database.
	<i>Discuss any adjustment to assay data.</i>	No adjustments or calibrations were made to any assay data reported.

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<b>Location of data points</b>	<i>Accuracy and quality of surveys used to locate drillholes (collar and down-hole surveys), trenches, mine workings and other locations used in Mineral Resource estimation.</i>	Drillhole collars were located by GPS. Elevation values were in AHD. Expected accuracy is +/- 5 m for easting, northing and 0.50m for elevation coordinates.
	<i>Specification of the grid system used.</i>	The grid system is GDA94 (MGA), zone 51.
	<i>Quality and adequacy of topographic control.</i>	A topographic surface has been created from aerial geophysical data. Drillhole collars are corrected to this surface.
<b>Data spacing and distribution</b>	<i>Data spacing for reporting of Exploration Results.</i>	The nominal drillhole spacing is 40 m (easting) by 80 or 100 m (northing). Infill drilling has been conducted at a nominal 40m x 20m spacing.
	<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>	The mineralised domains have not yet demonstrated sufficient continuity in both geological and grade continuity to support the definition of Mineral Resource and Reserves, and the classifications applied under the 2012 JORC Code.
	<i>Whether sample compositing has been applied.</i>	No compositing has been applied to the exploration results.
<b>Orientation of data in relation to geological structure</b>	<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>	The orientation of mineralised structures has not been ascertained. To avoid bias drilling to date has been vertical. Drilling is mainly restricted to the overlying regolith and seldom penetrates fresh rock by more than a couple of metres.
	<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>	No orientation based sampling bias has been identified in the data at this point.
<b>Sample security</b>	<i>The measures taken to ensure sample security.</i>	Chain of custody is managed by Sirius. Samples are stored on site and either delivered by Sirius personnel to Perth and then to the assay laboratory, or collected from site by Esperance Freightlines and delivered direct to the assay laboratory. Whilst in storage, they are kept on a locked yard. Tracking sheets have been set up to track the progress of batches of samples.
<b>Audits or reviews</b>	<i>The results of any audits or reviews of sampling techniques and data.</i>	No audits or reviews have been conducted at this stage.

## SECTION 2 REPORTING OF EXPLORATION RESULTS

Criteria	JORC Code explanation	Commentary
<b>Mineral tenement and land tenure status</b>	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.	The drilling is located wholly within Exploration Licence E15/1298. The tenement is 100% owned by Polar Metals Pty Ltd, a wholly owned subsidiary of Sirius Resources NL. The tenement sits within the Ngadju Native Title Claim (WC99/002).

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	The security of the tenure held at the time of reporting along with any known impediments to obtaining a licence to operate in the area.	The tenement is in good standing and no known impediments exist.
<b>Exploration done by other parties</b>	Acknowledgment and appraisal of exploration by other parties.	Plutonic Operations Limited and Homestake Gold of Australia Limited conducted reconnaissance aircore drilling (PBAC prefix) over Lake Cowan on predominantly 100 m drillhole spacing and 800 m line spacing from 1997-1999. Location of these drillholes cannot be verified as the collars are now mostly obscured. Aircore sampling was done by 4 m composites with 1 m resplits on samples greater than 0.1 g/t. Samples were assayed by aqua-regia digest with AAS finish although this cannot be verified as the original laboratory certificates are not available.
<b>Geology</b>	Deposit type, geological setting and style of mineralisation.	Baloo is situated within the Archaean Norseman-Wiluna Belt which locally includes basalts, komatiites, metasediments, and felsic volcanoclastics. The primary gold mineralisation is related to hydrothermal activity during multiple deformation events. Indications are that mineralisation is focused on or near to the stratigraphic boundary between the Killaloe and Buldania Formation. The mineralisation appears hosted in weathered basement with strong correlation to sulphidic quartz veining alteration.
<b>Drill hole information</b>	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 metres) 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>	Refer to Annexure1 in body of text.
<b>Data aggregation methods</b>	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.	All reported assays have been length weighted. No top-cuts have been applied. A nominal 0.2 g/t Au lower cut-off is reported as been significant in the context of the geological setting.
	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.	High grade gold intervals internal to broader zones of gold mineralisation are reported as included intervals.
	The assumptions used for any reporting of metal equivalent values should be clearly stated.	No metal equivalent values are used for reporting exploration results.
<b>Relationship between mineralisation widths and intercept lengths</b>	These relationships are particularly important in the reporting of Exploration Results. If the geometry of the mineralisation with respect to the drill hole angle is known, its nature should be reported. 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').	The geometry of the primary mineralisation is not known at present due to the lack of deeper drilling and the early stage of exploration. The trend of mineralisation appears broadly north south and is coincident with an elevated arsenic trend in bedrock.

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<b>Diagrams</b>	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.	Refer to Figures in body of text.
<b>Balanced reporting</b>	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.	All significant results are reported, with a 0.2 g/t lower cut-off.
<b>Other substantive exploration data</b>	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.	Refer to figures in body of text.
<b>Further work</b>	The nature and scale of planned further work (e.g. tests for lateral extensions or depth extensions or large-scale step-out drilling). Diagrams clearly highlighting the areas of possible extensions, including the main geological interpretations and future drilling areas, provided this information is not commercially sensitive	At this stage, mineralisation is only indicative and requires further infill to test for coherency. Diamond drilling in the bedrock beneath anomalous zones has been started to establish the orientation and style of the mineralisation. Diamond coring with PQ3 triple tube will be used to verify current aircore results in the oxide zone to determine their suitability for resource definition. Aircore drilling will be used to further define anomalism along strike and in similar litho-structural positions inferred from aeromagnetic interpretation.