

DE GREY MINING LTD

The Bold Explorer

QUARTERLY REPORT

FOR THE QUARTER ENDING 31 MARCH 2012

ASX CODE: DEG

Shares on Issue

396,914,226

Board of Directors

*Darren Townsend
Chairman*

*Gary Brabham
Managing Director*

*Jason Brewer
Director*

Company Secretary

Dennis Wilkins

Exploration Manager

Glenn Martin

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A.B.N. 65 094 206 292

Highlights

Argentina Projects (gold, silver)

- Drilling contractor secured and access earthworks underway at Sierra Morena project. Drilling start expected in June quarter.
- Detailed mapping and soil sampling outlines very encouraging epithermal veins at SM6 Prospect at Sierra Morena project.
- Stream sediment geochemistry over Halcon Project outlines anomalous areas for follow-up.

Turner River Project (gold, base metals, Lansdowne Resources earning 75%)

- Maiden resource estimates for Amanda and Mt Berghaus gold deposits bring total gold resources at Turner River to **6.72Mt @ 1.41g/t Au for 305,000 oz.**
- Maiden estimates of base and precious metals resources at Discovery and Orchard Tank deposits total **2.6Mt @ 2.7% Zn, 1.1% Pb, 89g/t Ag, 0.7g/t Au.** Potential remains for extensions at both deposits.

Corporate

- Capital raising successfully completed for gross proceeds of **\$2.48 million.**
- Advance sale of royalty over the first 2Mt of iron ore to be produced from Mt Dove nets **\$1 million** after Quarter end.



DE GREY MINING LTD QUARTERLY OPERATIONS REPORT FOR THE QUARTER ENDING 31 MARCH 2012

Santa Cruz Province – Sierra Morena Project

Vein Breccia Target

Sampling of the Vein Breccia target and surrounding area has located numerous vein and vein float occurrences with rock samples returning up to **11.75g/t Au and 96.2g/t Ag**¹ accompanied by significant arsenic, lead and zinc over an area of approximately 750 metres by 800 metres (Figure 2). Soil sampling has similarly indicated potential for multiple mineralised structures although a significant portion of the area is overlain by scree and soil that possibly obscures other veins.

Detailed geological mapping indicates that mineralised veins may be hosted by a northwest trending duplex fault system with high metal grades associated with both the northwest striking boundary structures and north-south striking extensional faults.

Multi-element geochemistry and quartz vein types indicate that the Vein Breccia target represents the upper portion of a preserved epithermal system, with more crystalline quartz types, and associated higher precious metals grades, being expected at depth.

De Grey's work has progressed the Vein Breccia target to drill ready status. During the quarter, land access agreements were executed with holders of surface land rights, access roads and drill pads constructed and a drilling contractor sourced. Drilling is expected to commence in the June quarter, with an initial program of 750 metres of diamond core drilling planned.

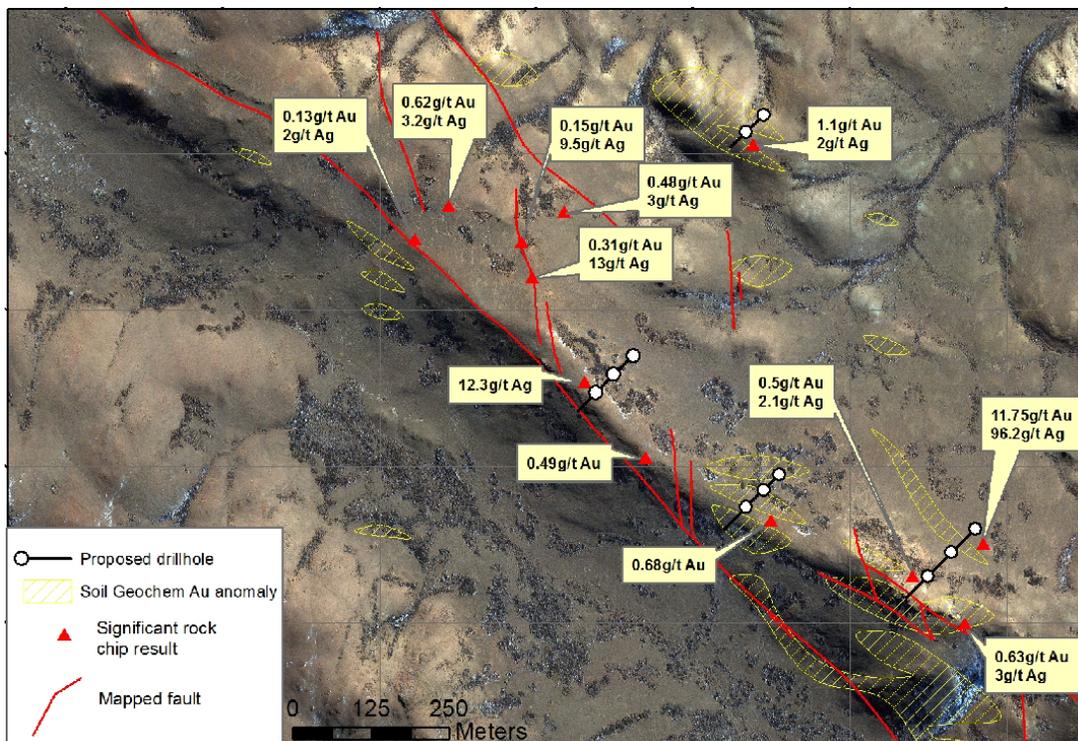


Figure 2: Sierra Morena Vein Breccia target, proposed drill locations, including provisional holes

¹ Refer to De Grey's ASX release dated 8 December 2011 for details.



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SM6 Prospect

The SM6 prospect, discovered by follow-up of a low-level stream sediment geochemical anomaly, comprises an area of strong argillic (clay) alteration exposed in a 700 metre by 500 metre window through transported cover in an area of recessive weathering. Reconnaissance of the surrounding area has revealed other outlying zones of similar argillic alteration and several epithermal quartz vein occurrences where previously reported rock chip samples have returned up to **14g/t Au and 24.4g/t Ag.**²

Soil sampling and detailed mapping have now been completed over the area, outlining two mineralized vein trends (Figure 3). The Western Zone consists of quartz veining and siliceous breccia in discontinuous exposures over approximately 450 metres strike length. The structure disappears beneath soil and scree cover to the north and south but a second exposure of quartz veining about 300 metres to the south may represent a continuation of the same structure. Soil geochemistry outlines a coincident Au-Ag-As-Hg-Sb anomaly over a strike distance of more than 1.2 kilometres.

The Eastern Zone consists of quartz veining and silicification exposed over approximately 300 metres strike length that also disappears beneath soil and scree to the north and south. A coincident Au-Ag-As-Hg-Sb anomaly in soils extends over a strike distance of approximately 850 metres.

Assays for further rock chip samples are awaited but De Grey is sufficiently encouraged by the results of mapping and soil sampling to plan for initial diamond drilling of the two vein trends in conjunction with the drilling planned for the Vein Breccia target. Commencement of drilling is contingent upon executing an access agreement with the surface landowner and receipt of regulatory approvals, both of which the Company expects to achieve in the June quarter.

The Sierra Morena project comprises two tenements covering 140 sq km of prospective Jurassic volcanic rocks in the western portion of the Deseado Massif, Santa Cruz Province. De Grey has entered into an option-to-purchase agreement over the properties on defined terms.

² Refer to De Grey's ASX release dated 8 December 2011 for details.



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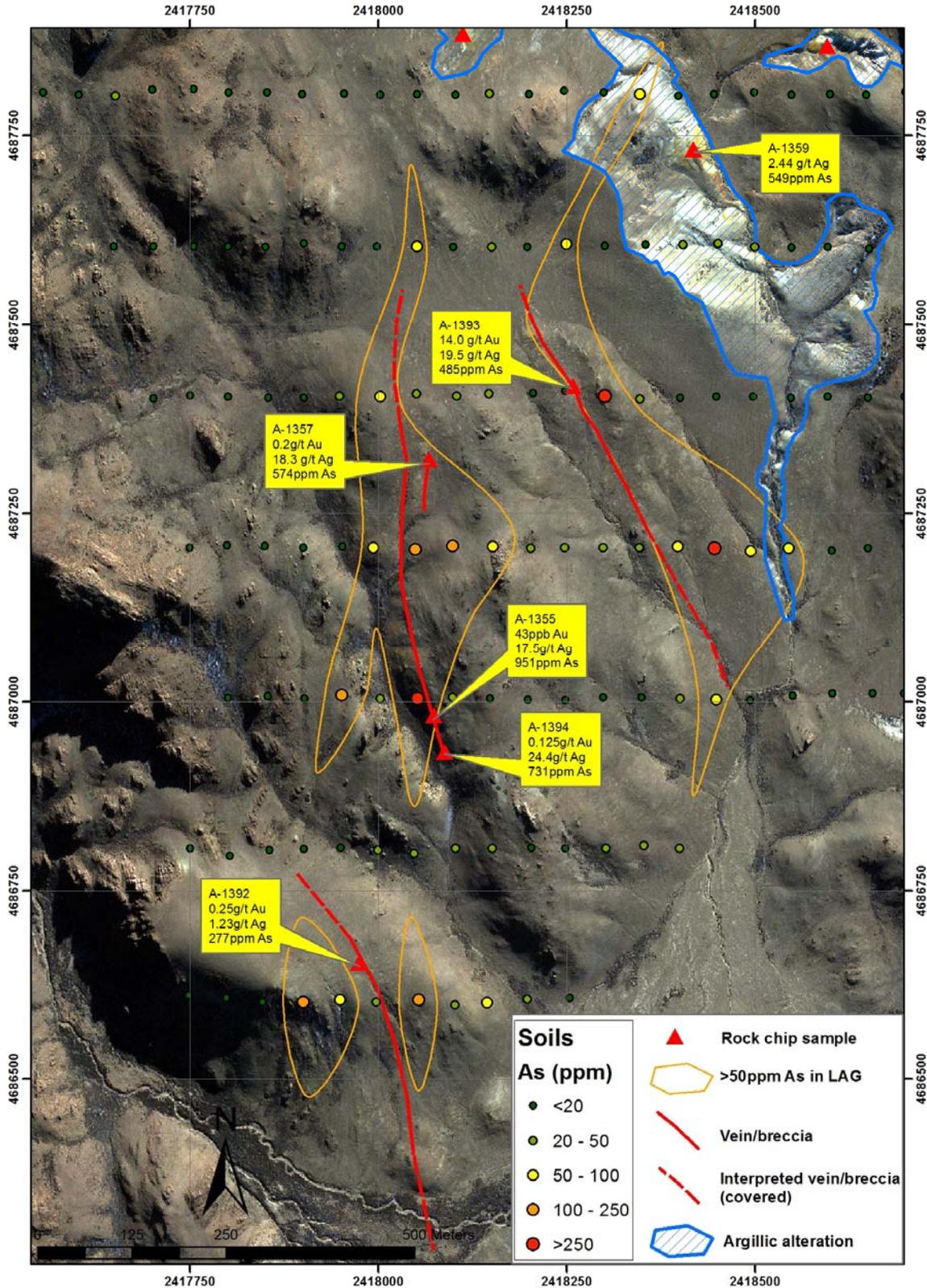


Figure 3: Sierra Morena SM6 target, rock and soil sampling sample results



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Santa Cruz Province – Pachi Project

De Grey's previous work at Pachi has defined an ENE striking, steeply dipping, mineralised structure outcropping over 400 metres strike where rock chip samples returned up to **60.7g/t Ag and 123ppb Au³** (Figure 4). The mineralized structure is located on the northern flank of a rhyolite dome, a significant feature in the context of Au-Ag mineralization in the Deseado Massif.

The Pachi target structure has been defined to drill-ready status and, pending landowner and regulatory approvals, De Grey plans to test it immediately following the drill campaign proposed for the nearby Sierra Morena project.

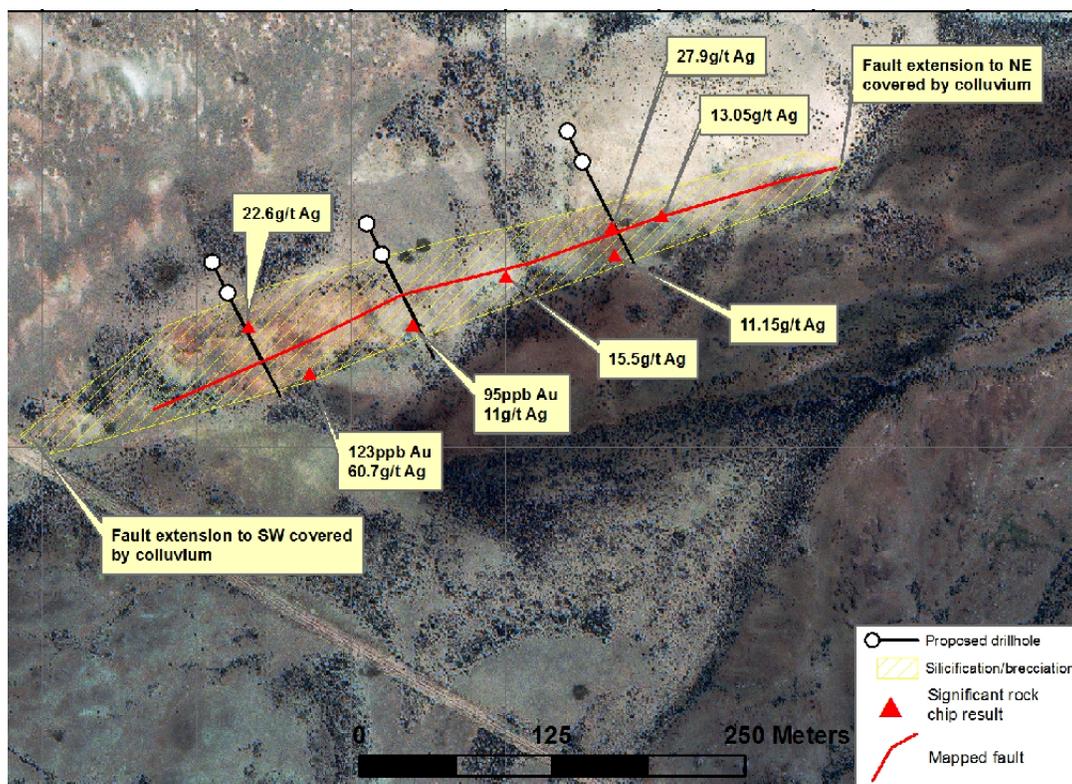


Figure 4: Pachi project, proposed drill locations

³ Refer to De Grey's ASX release dated 11 January 2012 for details.



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Santa Cruz Province – Halcon Project

A stream sediment sampling campaign was completed over the 180 sq km Halcon project in December 2011, with a total of 316 stream sediment samples collected at 158 sample sites. Assays were received during the March quarter.

The survey outlined fifteen target areas of elevated gold and/or multi-element signatures⁴ (Figure 5), most of which are associated with northwest trending faults, the typical control of most known epithermal vein deposits in the Deseado Massif.

Field checking of the targets has commenced in conjunction with an alteration and structural study using Aster data.

The Halcon Project is held 100% by De Grey and comprises applications for two categories (exploration licences). Jurassic volcanic rocks of the Chon Aike Formation, host to almost all known low-sulphidation epithermal Au-Ag mineralisation in the Deseado, outcrop or sub-crop over approximately 85% of the project area.

⁴ Refer to De Grey's ASX release dated 21 February 2012 for details.



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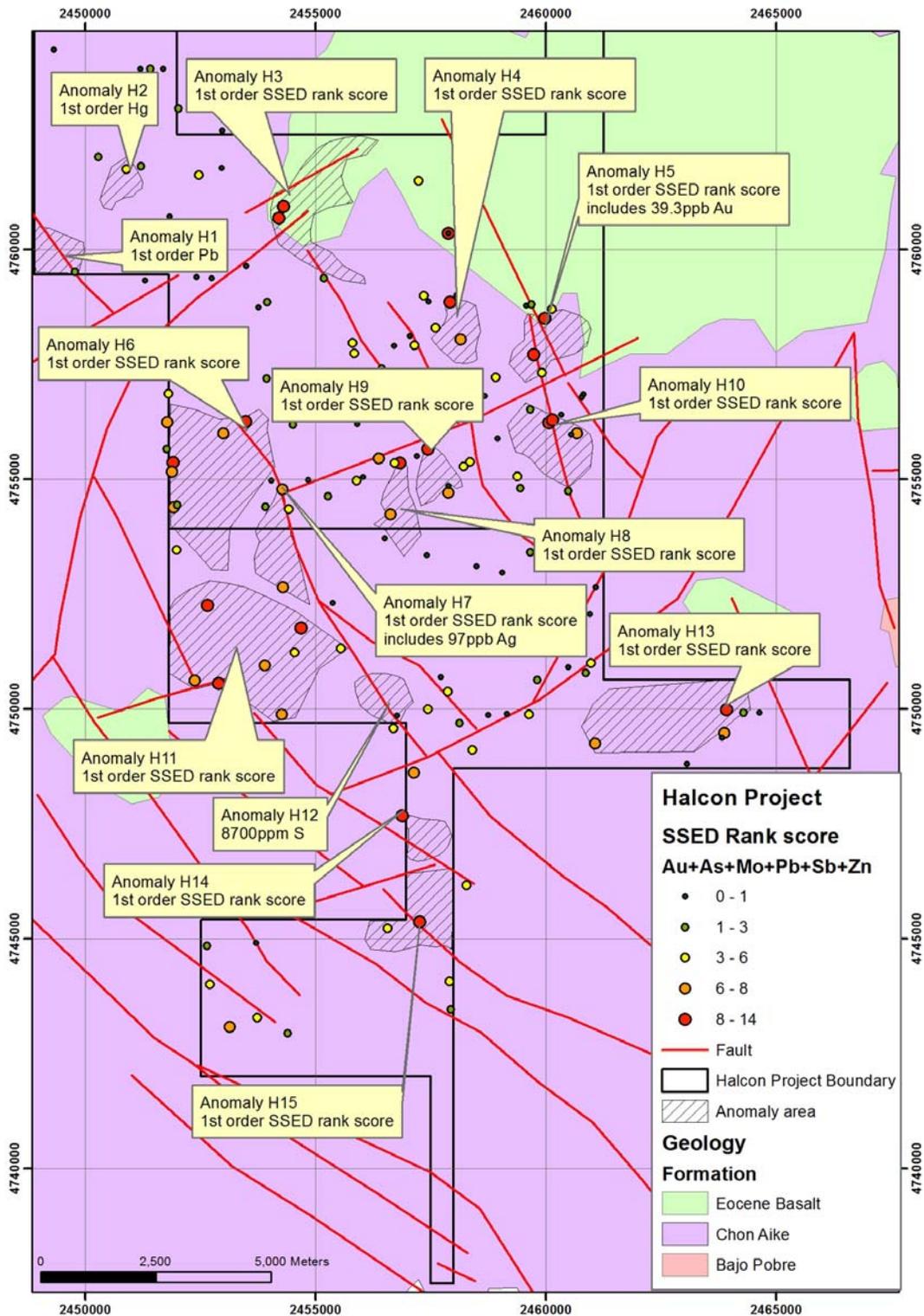


Figure 5: Halcon project, stream sediment sampling results



DE GREY MINING LTD QUARTERLY OPERATIONS REPORT FOR THE QUARTER ENDING 31 MARCH 2012

WESTERN AUSTRALIA - TURNER RIVER PROJECT

In May 2011 De Grey entered into agreements with Lansdowne Resources Pty Ltd, an unlisted Australian mineral exploration company, over the Company's Turner River gold and base metals exploration projects (Figure 6) under which Lansdowne may earn up to 75% interest in each project.

Lansdowne commissioned geological consultants Ravensgate to undertake maiden resource estimates for the Amanda and Mt Berghaus gold deposits, and the Discovery and Orchard Tank VMS-style Zn-Pb-Cu-Ag-Au deposits, the results of which were received during the quarter.

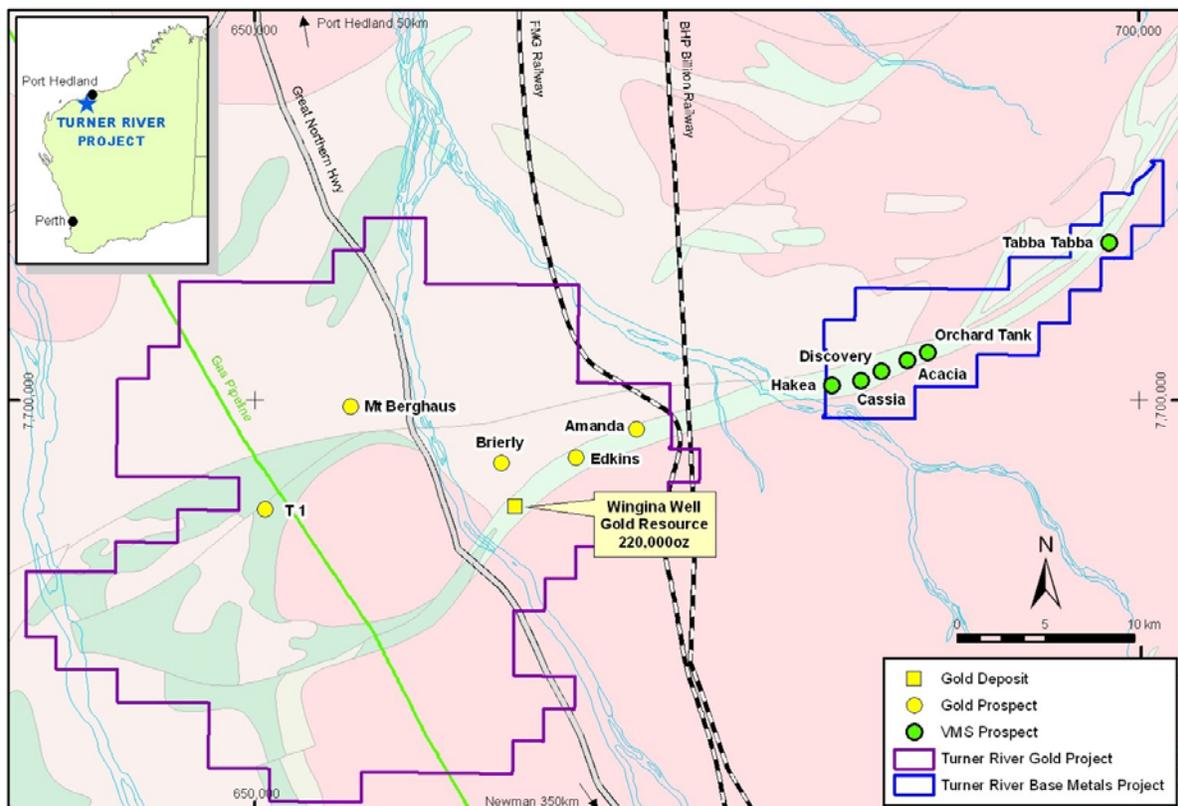


Figure 6: Turner River Gold and Base Metals project areas

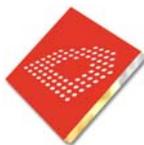
Turner River Gold

Maiden estimates of gold resources at Amanda and Mt Berghaus, at 0.5g/t Au cut-off grade, are:

Amanda: 687,000 tonnes @ 1.6g/t Au for 35,000 oz Au (inferred)

Mt Berghaus: 920,000 tonnes @ 1.4g/t Au for 43,000 oz Au (inferred)

The estimates follow a diamond core drilling program at Mt Berghaus undertaken by Lansdowne in late 2011 and a reinterpretation of geological controls on mineralisation at Amanda.



DE GREY MINING LTD QUARTERLY OPERATIONS REPORT FOR THE QUARTER ENDING 31 MARCH 2012

In conjunction with previous estimates for the Wingina Well deposit (5.11Mt @ 1.34g/t for 221,000 oz Au in measured, indicated and inferred resources at 0.5g/t Au cut-off), gold resources at Turner River Project, applying a 0.5g/t Au cut-off grade, now total:

6.72 million tonnes @ 1.41g/t Au for 305,000 oz Au (measured + indicated + inferred)⁵

There remain opportunities for further drilling to expand resources at both Amanda and Mt Berghaus.

Turner River Base Metals

Previous work by De Grey discovered VMS-style Zn-Pb-Ag-Au and subordinate copper mineralisation at a number of prospects over a strike length of 18 km in the eastern part of the Turner River project. Following a program of infill and limited extensional drilling in late 2011, Lansdowne commissioned Ravensgate to undertake resource estimates for the Discovery and Orchard Tank deposits, where drill coverage is now sufficient to outline inferred resources⁶.

Deposit	Category	Tonnes	Zn%	Pb%	Cu%	Ag g/t	Au g/t
Discovery	Inferred	1,116,000	2.6	1.0	0.1	94	0.9
Orchard Tank	Inferred	1,492,000	2.7	1.1	0.1	84	0.6
Total	Inferred	2,608,000	2.7	1.1	0.1	89	0.7

Table 1: Estimates of inferred resources at 1% Zn cut-off grade. Rounding may cause apparent inconsistencies in the table.

Both deposits feature areas that have yet to be drilled sufficiently to permit reliable estimations of metal grades. Those areas imply potential for an additional Exploration Target⁷ of 0.85-1Mt at similar average grades in direct extensions to the two deposits.

Corporate

During the quarter the Company completed a private placement and pro rata, non-renounceable entitlements issue, raising a combined total of approximately **\$2.48 million** prior to costs. The placement and entitlements issue were supported by Patersons Securities Limited.

Subsequent to the end of the reporting period, Atlas Iron Limited agreed to an advance purchase of the royalty payable over the first 2 million tonnes of iron ore to be produced from Mount Dove for a cash payment of **\$1 million**. Proceeds were received by De Grey on 16 April 2012.

⁵ Refer to De Grey's ASX release dated 11 April 2012 for details concerning gold resource estimates.

⁶ Refer to De Grey's ASX release dated 11 April 2012 for details concerning base metals resources estimates.

⁷ The target mineralisation tonnage and grade is conceptual in nature as there has been insufficient exploration at this stage to define a Mineral Resource and it is uncertain if further exploration will result in definition of a Mineral Resource.



DE GREY MINING LTD QUARTERLY OPERATIONS REPORT FOR THE QUARTER ENDING 31 MARCH 2012

The information in the report to which this statement is attached that relates to Exploration Results is based on information compiled by Mr Glenn Martin, who is a Member of the Australasian Institute of Mining and Metallurgy and is an employee of De Grey Mining Ltd. Mr Martin has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2004 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves" (the "JORC Code"). Mr Martin consents to the inclusion in the report of the matters based on his information in the form and context in which it appears

The information in this report that relates to resource estimates for Amanda, Mt Berghaus, Discovery and Orchard Tank deposits is based on information compiled by Mr Stephen Hyland, independent consulting geologist and principal of Ravensgate. Mr Hyland is a Fellow of the Australasian Institute of Mining and Metallurgy. Mr Hyland has sufficient experience which is relevant to the styles of mineralisation and types of deposit under consideration and to the activity which he is 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." (the "JORC Code"). Mr Hyland consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

The information in this report that relates to resource estimates for the Wingina Well gold deposit is based on information compiled by Mr Nic Johnson, independent consulting geologist and principal of MPR Geological Consultants Pty Ltd and a Member of the Australian Institute of Geoscientists. At the time of the Wingina Well resource estimate Mr Johnson was a full-time employee of Hellman & Schofield Pty Ltd. Mr Johnson has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which he is undertaking to qualify as a Competent Person as defined in the 2004 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves." (the "JORC Code"). Mr Johnson consents to the inclusion in the report of the matters based on his information in the form and context in which it appears.

Appendix 5B

Mining exploration entity quarterly report

Introduced 01/07/96 Origin Appendix 8 Amended 01/07/97, 01/07/98, 30/09/01, 01/06/10, 17/12/10

Name of entity

De Grey Mining Limited

ABN

65 094 206 292

Quarter ended ("current quarter")

31 March 2012

Consolidated statement of cash flows

Cash flows related to operating activities	Current quarter \$A'000	Year to date (9 months) \$A'000
1.1 Receipts from product sales and related debtors	-	-
1.2 Payments for (a) exploration & evaluation	(290)	(980)
(b) development	-	-
(c) production	-	-
(d) administration	(274)	(856)
1.3 Dividends received	-	-
1.4 Interest and other items of a similar nature received	9	40
1.5 Interest and other costs of finance paid	-	-
1.6 Income taxes paid	-	-
1.7 Other (provide details if material)	-	-
Net Operating Cash Flows	(555)	(1,796)
Cash flows related to investing activities		
1.8 Payment for purchases of: (a) prospects	-	-
(b) equity investments	-	-
(c) other fixed assets	-	(2)
1.9 Proceeds from sale of: (a) prospects	-	500
(b) equity investments	-	-
(c) other fixed assets	23	23
1.10 Loans to other entities	-	-
1.11 Loans repaid by other entities	-	-
1.12 Other (provide details if material)	-	-
Net investing cash flows	23	521
1.13 Total operating and investing cash flows (carried forward)	(532)	(1,275)

+ See chapter 19 for defined terms.

Appendix 5B
Mining exploration entity quarterly report

1.13	Total operating and investing cash flows (brought forward)	(532)	(1,275)
Cash flows related to financing activities			
1.14	Proceeds from issues of shares, options, etc.	2,487	2,487
1.15	Proceeds from sale of forfeited shares	-	-
1.16	Proceeds from borrowings	-	-
1.17	Repayment of borrowings	-	-
1.18	Dividends paid	-	-
1.19	Other (provide details if material)	(227)	(227)
Net financing cash flows		2,260	2,260
Net increase (decrease) in cash held		1,728	985
1.20	Cash at beginning of quarter/year to date	635	1,376
1.21	Exchange rate adjustments to item 1.20	(1)	1
1.22	Cash at end of quarter	2,362	2,362

Payments to directors of the entity and associates of the directors

Payments to related entities of the entity and associates of the related entities

		Current quarter \$A'000
1.23	Aggregate amount of payments to the parties included in item 1.2	117
1.24	Aggregate amount of loans to the parties included in item 1.10	-

1.25 Explanation necessary for an understanding of the transactions

Item 1.23 includes aggregate amounts paid to directors including salary, directors' fees, consulting fees and superannuation.

Non-cash financing and investing activities

2.1 Details of financing and investing transactions which have had a material effect on consolidated assets and liabilities but did not involve cash flows

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2.2 Details of outlays made by other entities to establish or increase their share in projects in which the reporting entity has an interest

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Financing facilities available

Add notes as necessary for an understanding of the position.

		Amount available \$A'000	Amount used \$A'000
3.1	Loan facilities	Nil	Nil
3.2	Credit standby arrangements	Nil	Nil

+ See chapter 19 for defined terms.

Estimated cash outflows for next quarter

		\$A'000
4.1	Exploration and evaluation	635
4.2	Development	-
4.3	Production	-
4.4	Administration	260
Total		895

Reconciliation of cash

Reconciliation of cash at the end of the quarter (as shown in the consolidated statement of cash flows) to the related items in the accounts is as follows.

	Current quarter \$A'000	Previous quarter \$A'000
5.1 Cash on hand and at bank	1,744	61
5.2 Deposits at call	618	574
5.3 Bank overdraft	-	-
5.4 Other (provide details)	-	-
Total: cash at end of quarter (item 1.22)	2,362	635

Changes in interests in mining tenements

	Tenement reference	Nature of interest (note (2))	Interest at beginning of quarter	Interest at end of quarter
6.1		Interests in mining tenements relinquished, reduced or lapsed		
6.2		Interests in mining tenements acquired or increased		

+ See chapter 19 for defined terms.

Appendix 5B
Mining exploration entity quarterly report

Issued and quoted securities at end of current quarter

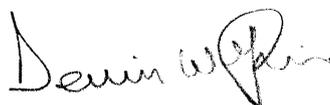
Description includes rate of interest and any redemption or conversion rights together with prices and dates.

	Total number	Number quoted	Issue price per security (see note 3) (cents)	Amount paid up per security (see note 3) (cents)
7.1 Preference +securities <i>(description)</i>				
7.2 Changes during quarter (a) Increases through issues (b) Decreases through returns of capital, buy-backs, redemptions				
7.3 +Ordinary securities	396,914,226	396,914,226		
7.4 Changes during quarter (a) Increases through issues (b) Decreases through returns of capital, buy-backs	138,051,876	138,051,876		
7.5 +Convertible debt securities <i>(description)</i>				
7.6 Changes during quarter (a) Increases through issues (b) Decreases through securities matured, converted				
7.7 Options <i>(description and conversion factor)</i>	10,000,000 10,500,000		<i>Exercise price</i> 6.5 cents 6.5 cents	<i>Expiry date</i> April 2014 June 2014
7.8 Issued during quarter				
7.9 Exercised during quarter				
7.10 Expired/cancelled during quarter				
7.11 Debentures <i>(totals only)</i>				
7.12 Unsecured notes <i>(totals only)</i>				

+ See chapter 19 for defined terms.

Compliance statement

- 1 This statement has been prepared under accounting policies which comply with accounting standards as defined in the Corporations Act or other standards acceptable to ASX (see note 5).
- 2 This statement does ~~not~~* (*delete one*) give a true and fair view of the matters disclosed.



Sign here:

(Company secretary)

Date: 27 April 2012

Print name: **Dennis Wilkins**

Notes

- 1 The quarterly report provides a basis for informing the market how the entity's activities have been financed for the past quarter and the effect on its cash position. An entity wanting to disclose additional information is encouraged to do so, in a note or notes attached to this report.
- 2 The "Nature of interest" (items 6.1 and 6.2) includes options in respect of interests in mining tenements acquired, exercised or lapsed during the reporting period. If the entity is involved in a joint venture agreement and there are conditions precedent which will change its percentage interest in a mining tenement, it should disclose the change of percentage interest and conditions precedent in the list required for items 6.1 and 6.2.
- 3 **Issued and quoted securities** The issue price and amount paid up is not required in items 7.1 and 7.3 for fully paid securities.
- 4 The definitions in, and provisions of, *AASB 6: Exploration for and Evaluation of Mineral Resources* and *AASB 107: Statement of Cash Flows* apply to this report.
- 5 **Accounting Standards** ASX will accept, for example, the use of International Financial Reporting Standards for foreign entities. If the standards used do not address a topic, the Australian standard on that topic (if any) must be complied with.

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+ See chapter 19 for defined terms.