



20 November 2009

## **NEX METALS EXPLORATIONS LTD**

### **Nex Assesses Kookynie Gold Project 100,000 ounce annual production target**

#### **Introduction**

Nex Metals Explorations Ltd (ASX; NME) ("Nex") is pleased to announce the following update and plans for progression of its 100% owned Kookynie Project.

The recent Mineral Resource Estimate of 12.3 Mt at 1.1 g/t Au for 432,000 ounces of gold for Phase 2 (part of the Nex Metals 3 Phase Plan for Growth, see table 1 in this release, or to refer website [www.nexmetals.com](http://www.nexmetals.com)), has prompted the directors of Nex to reassess the Kookynie Gold Project in terms of a bulk tonnage low grade Heap Leach operation. The directors of Nex have developed a plan whereby gold production may be robustly and inexpensively expanded to 100,000 ounces of gold per annum, in addition to the 15,000 ounce Phase 1 dump leach.

The plan to produce 100,000 ounces of gold per annum is now in the Comprehensive Feasibility Study (CFS) stage. The CFS will define the development and operating parameters. Once completed the board intends to expedite the development of the project. The Nex plan allows the company to move swiftly and inexpensively into the ranks of a mid tier gold producer with costs at the lower end of the production scale.

Nex believe there is potential to increase these resources along strike and down dip. The existing resources have been drilled by close spaced (20m X 20m) reverse circulation (RC) drilling and the resources are from the surface to 120 metres depth as a series of horizontally stacked lodes.

#### **The plan to expand gold production to 100,000 ounces per annum**

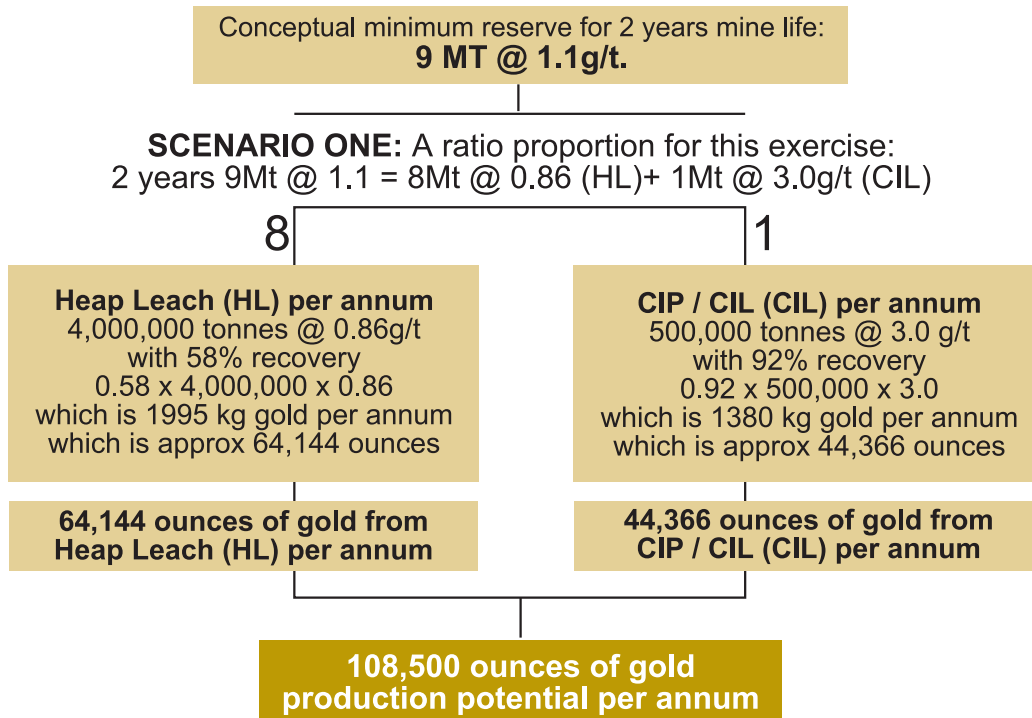
Two scenarios are presented in calculations over page. The optimistic scenario is:

- Mine 2.25 million tonnes of ore per annum from the Admiral Butterfly area. The tonnage is comprised of 2.0 Mt of lower grade 0.86 which will go on to a heap leach and 250,000 tonnes @ 3.0 g/t which will go into a 500,000 tonne per annum CIP / CIL gold treatment plant.
- Mine 2.25 million tonnes of ore per annum from the Orient Well area. The tonnage is comprised of 2.0Mt of lower grade 0.86 which will go on to a heap leach and 250,000 tonnes @ 3.0 g/t which will go into a 500,000 tonne per annum CIP / CIL gold treatment plant.

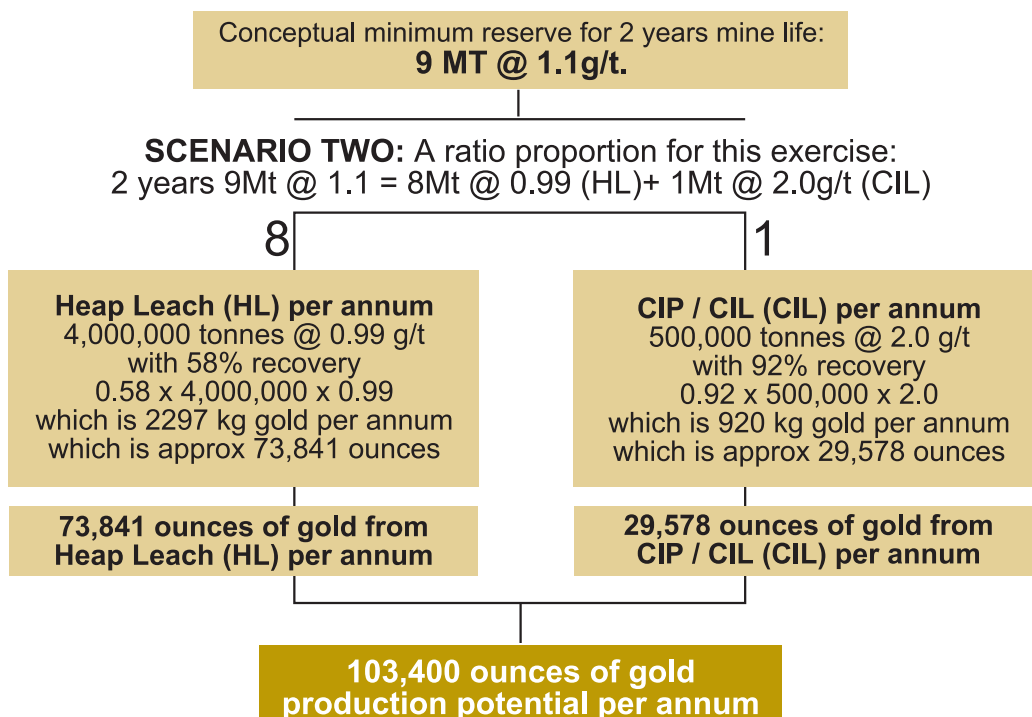


• **Calculations**

Nex believe a minimum mine life of 2 years is a realistic and achievable target using the previously reported resources coupled with the potential from nearby gold prospects all ready drilled and undergoing Mineral resource evaluation inline with JORC Guidelines and the current gold price.



**OR**





## Salient Points

- **There are 6 existing additional Phase 2 prospects that require mineral resource evaluation inline with JORC Guidelines, prior to being added to inventory**
- **Potential for extension (along strike and at depth) of resources already reported to the ASX**
- **Preliminary metallurgical test work show positive results for Heap Leach treatment**
- **Historical gold produced in the Kookynie district is free milling**
- **An abundance of quality raw water**
- **Significant infrastructure already in place**
- **Central location easy access**
- **There are 6 existing additional Phase 2 prospects that require mineral resource evaluation inline with JORC Guidelines, prior to being added to inventory**

The recent Resource Estimate for Phase 2 has a calculated 12.3Mt at 1.1 g/t for 432,000 ounces of gold from surface to a maximum depth of 120 metres. In addition to the quoted Resource Estimates are a number of smaller resources, Danluce, King, The Hanging Wall Lode and the East Lode. All are drilled with RC, some are close spaced to 20m X 20m. These resources will also be upgraded when a comprehensive optimisation is completed.

- **Potential for extension to resources reported to the ASX**

The resource estimate is based on existing close spaced RC drilling (20 X 20 refer figure 2). The mineralisation occurs as flat dipping  $\leq 30^\circ$  lodes in a rhombahedral ladder arrangement.

Horizontal lode repetitions are noted and appear to occur within approximately 30 to 40 vertical metres intervals. They are bounded by peripheral sub vertical mineralised faults (refer figures 2 & 3). This means increasing depth could have less of a negative impact on stripping ratios and economics. The gold mineralisation is open along strike, within the Nex tenements and down dip (refer figures 2 & 3).

The Kookynie dataset is comprised of roughly 17,000 drillholes with only 120 of these drilled deeper than 100 metres beneath the natural surface.

- **Preliminary metallurgical test work show positive results for Heap Leach treatment**

Preliminary metallurgical test work, reported to the ASX July 2009, indicated the mineralised rocks displayed excellent leach characteristics. The results of these 2 tests is 58% and >68% recoveries on 2.4 g/t rock. The reason for the good metallurgical recoveries is the geology and how the gold mineral was deposited.

The geology consists of E-W trending Dolerite dykes in Archaean volcanic rock (refer figure 1). The Dolerite, very similar in chemistry to the Kalgoorlie Dolerites, display brittle deformation whereby the volcanic has a more ductile deformation.

In simple terms when the late stage structures with gold fluids came smashing through the rocks, the harder Dolerites were fractured and opened, like brittle glass, depositing quartz and minerals (gold) in the fracture spaces. The same structures passed through



the softer Volcanic rock which smeared and sheared, more like a plasticine, depositing lower grade gold mineralisation.

- **Historical gold produced in the Kookynie district is free milling**

All metallurgical test work to date has confirmed that the Admiral Butterfly and Orient Well gold is free milling.

- **An abundance of quality raw water**

In addition to an established bore field which previously supplied the Orient Well mill @ 1.2Mt p/a there is a large source of water remaining in the bottom of the current open pits.

- **Significant infrastructure already in place**

Much of the required infrastructure is already in place. This will significantly reduce start up capital requirements.

The Kookynie Gold Project currently has;

1. A 35 man camp, on a site which previously hosted a 120 man camp
2. established network of haul roads in excellent condition
3. an operational borefield with all plumbing
4. office facilities with telephone and internet

- **Central location easy access**

The project is located in the Menzies Shire approximately 200km north of Kalgoorlie on the bitumised Goldfields Highway. The Phase 2 areas are located within 9km to the east of the highway on an all weather access road.

### **Milestones (Development Action Plan)**

1. Complete the current Phase 2 mineral resource inventory inline with JORC Guidelines
2. Complete H&S proposed drilling (9 RC holes) to provide required QA/QC on historical drilling dataset for increased confidence in the existing Mineral Resource Estimate inline with JORC Guidelines.
3. Capital raising to fund and fast track the scoping study.
4. Diamond drilling to provide data for metallurgical studies of ore.
5. Open pit optimisation study.
6. Develop a fully costed detailed mining and treatment plan.
- 7 Additional capital raising to fund the construction of expanded facilities and the mining development.

The Board of Nex Metals Explorations Ltd believe this is a realistic approach to exploitation of an underrated gold asset that will provide long term value to Shareholders.

Nex will keep shareholders apprised as to the status of the development plan as it evolves and when milestones are achieved.



### Responsibility Statement

The information in this report which relates to exploration results, quality of data, geological interpretations, reasonable expectation of potential viability of quoted gold resources, comments on metallurgy and marketing and appropriateness of cut-off grades, and Nex's comments on the H&S estimates is based on information compiled by Edd Prumm who is the Technical Director and Exploration Manager of the Company and who is a Member of the Australasian Institute of Mining and Metallurgy. Mr Prumm 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". Mr Prumm consents to the reporting of this information in the form and context in which it appears.

**Note:** Use of decimal points does not imply an increased level of precision.

Information in this report that relates to mineral resource estimation reflects information compiled by Mr Robert Spiers. Resource estimation was undertaken by Mr Spiers who is a full time employees of Hellman and Schofield Pty Ltd. Mr Spiers is a Member of the Australian Institute of Geoscientists and 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 Competent Person as defined in the 2004 Edition of the "Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves". Mr Spiers consents to the reporting of this information in the form and context in which it appears.

## Table 1 - Phase 2 Mineral Resource Estimates – Kookynie Gold Project inline with JORC Guidelines

### Resource summary at a 0.5g/t cut-off grade

Deposit	Indicated			Inferred			Total		
	Mt	Au g/t	Ounces	Mt	Au g/t	Ounces	Mt	Au g/t	Ounces
Total	9.46	1.11	337,000	2.86	1.0	93,000	12.30	1.1	432,000

### Resource summary at a 1.0g/t cut-off grade

Deposit	Indicated			Inferred			Total		
	Mt	Au g/t	Ounces	Mt	Au g/t	Ounces	Mt	Au g/t	Ounces
Total	2.88	1.83	169,000	0.68	1.7	37,000	3.55	1.8	207,000

### Resource summary at a 1.5g/t cut-off grade

Deposit	Indicated			Inferred			Total		
	Mt	Au g/t	Ounces	Mt	Au g/t	Ounces	Mt	Au g/t	Ounces
Total	1.10	2.50	88,000	0.22	2.6	18,000	1.31	2.5	106,000

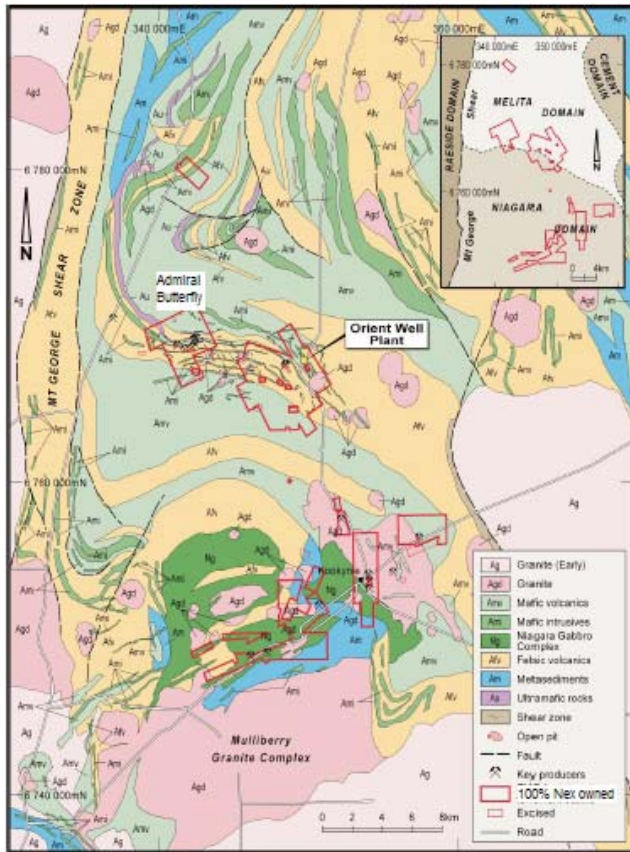
1- Additional decimal places do not imply an added level of precision.

Note: Figures quoted may not sum due to rounding.

The Resource Estimation was completed by independent geological consultants, Hellman and Schofield (H&S) of Perth, Western Australia.

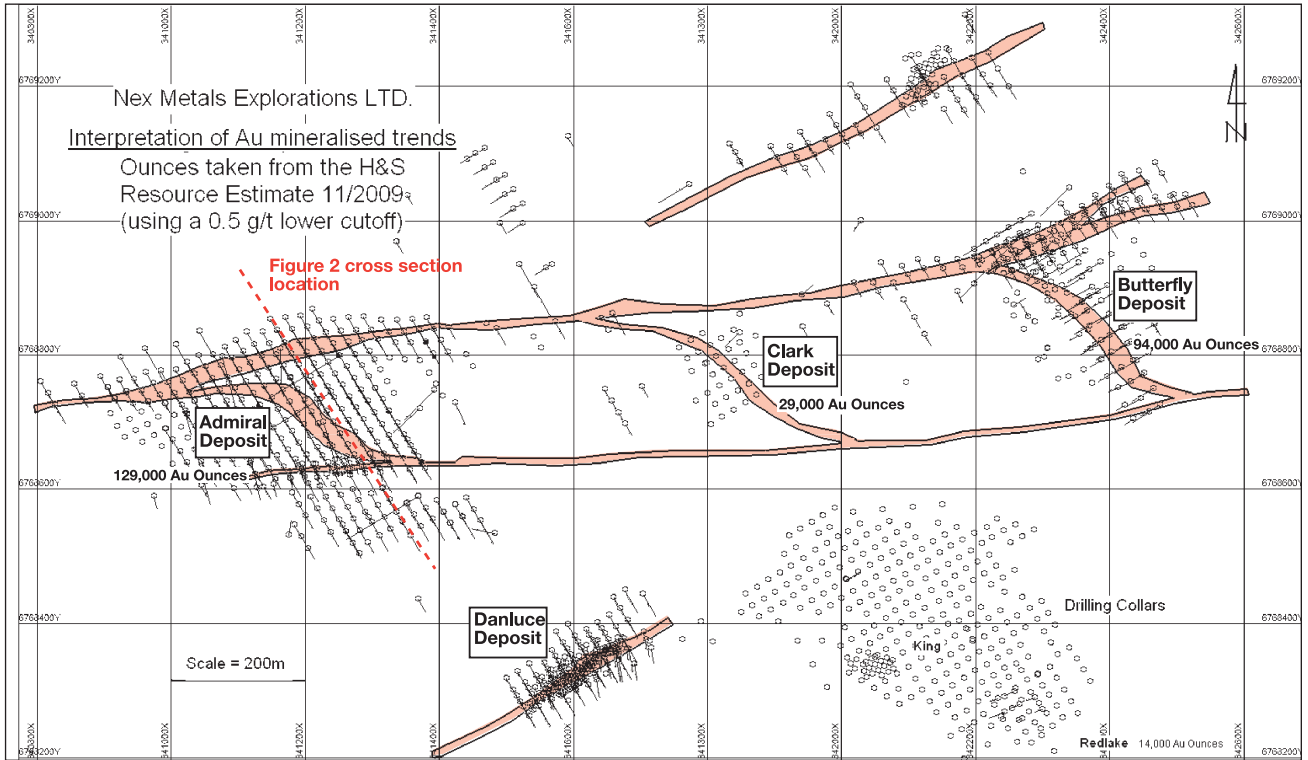


Figure 1 Location and geology of the Phase 2 Orient Well and Admiral Butterfly.





**Figure 2 Plan of Admiral - Butterfly drilling, note the undrilled areas. – 100% Nex Metals**



**Figure 3 a cross section on the eastern periphery of the Admiral prospect. Note the close spaced yet quite shallow drilling**

