



Prairie Downs

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ASX RELEASE

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Geochemical Survey Results

HIGHLIGHTS

- Analysis of geochemical soil survey data has identified 22 targets based on favourable attributes indicating potential base metal mineralisation. 8 of these targets are considered high priority with excellent potential for new base metals discoveries.
- The relative anomalism of the high priority targets compared with the geochemical footprint of the existing resource indicates any one of the high priority targets has the potential to replicate known mineralisation and increase the Company's resource inventory.
- The targets generated occur within and adjacent to the Prairie Downs Fault zone and demonstrate intermittent base metal anomalism along 20 km of strike extent. This is a positive endorsement of the Company's revised exploration strategy that is focused on the discovery of further near surface ore positions along strike.
- Planning is currently underway for follow up exploration program which will involve drill testing various targets in the coming months.

GEOCHEMICAL SOIL SURVEY RESULTS

Prairie Downs Metals Ltd has reviewed interpreted results from ioGlobal Pty Ltd following the receipt of final assay results for the soil geochemical survey completed in December 2009. The survey covered an area of 23 km by 1.5 km over the prospective Prairie Downs Fault using a 400m line and 100m sample spacing grid (See Figure 1). The soil survey was designed using these parameters with the purpose of providing a first pass assessment of the potential for further base metal mineralization along the length of this largely untested structural corridor.

The program consisted of 922 samples which were analysed by the ALS Laboratories Group utilising an ionic leach analytical method that assayed a suite of 62 elements including lead isotopes Pb206 to Pb208 and gold. The survey identified 22 locations of relative anomalism of which 8 are considered high priority targets. Areas of anomalism were identified by their favourable attributes (as listed below) with high priority targets consisting of 2 or 3 coincident attributes.

- Anomalous Zn or Pb results.
- Coincidence of anomalism across a suite of elements, particularly Zn, Pb, Cu, Cd and Mo.
- Anomalous Pb207 / Pb206 and Pb208 / Pb206 ratios.
- Dilational bends within the Prairie Downs Fault

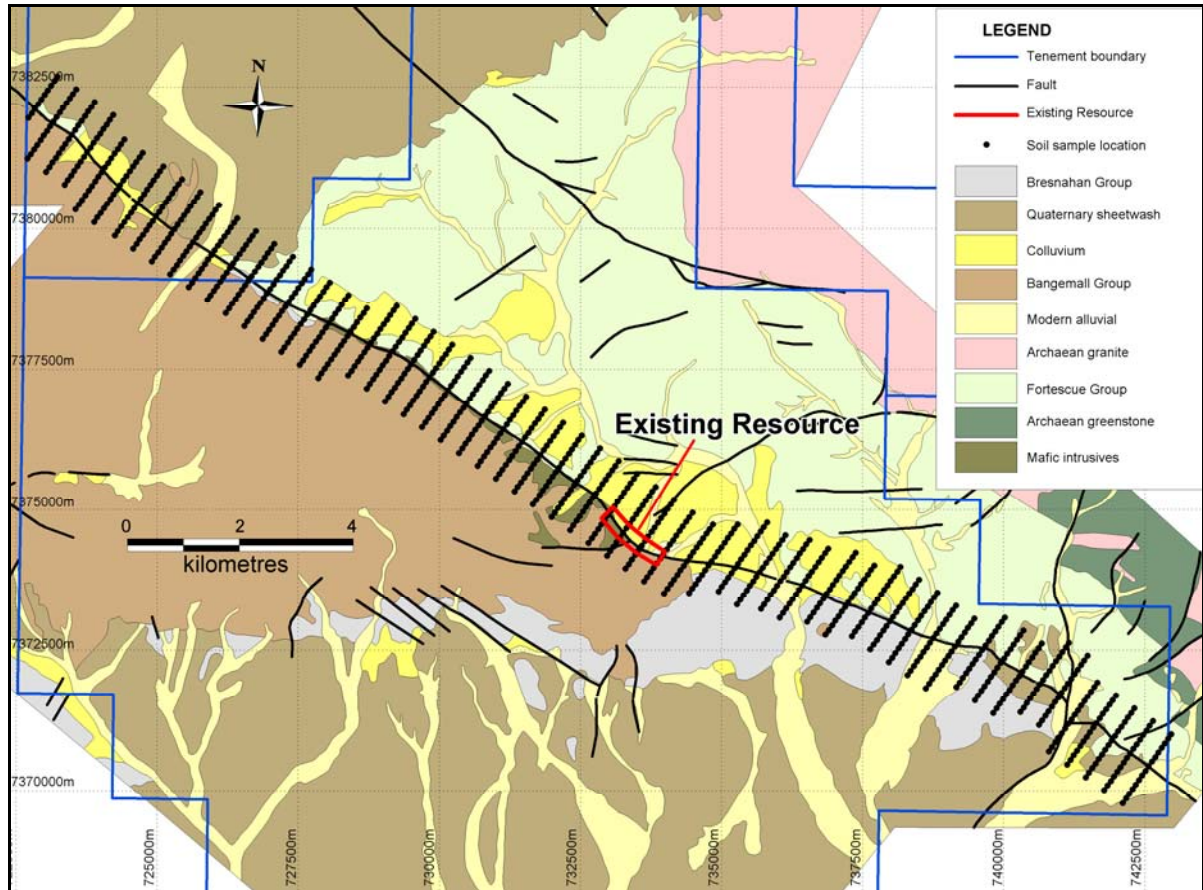
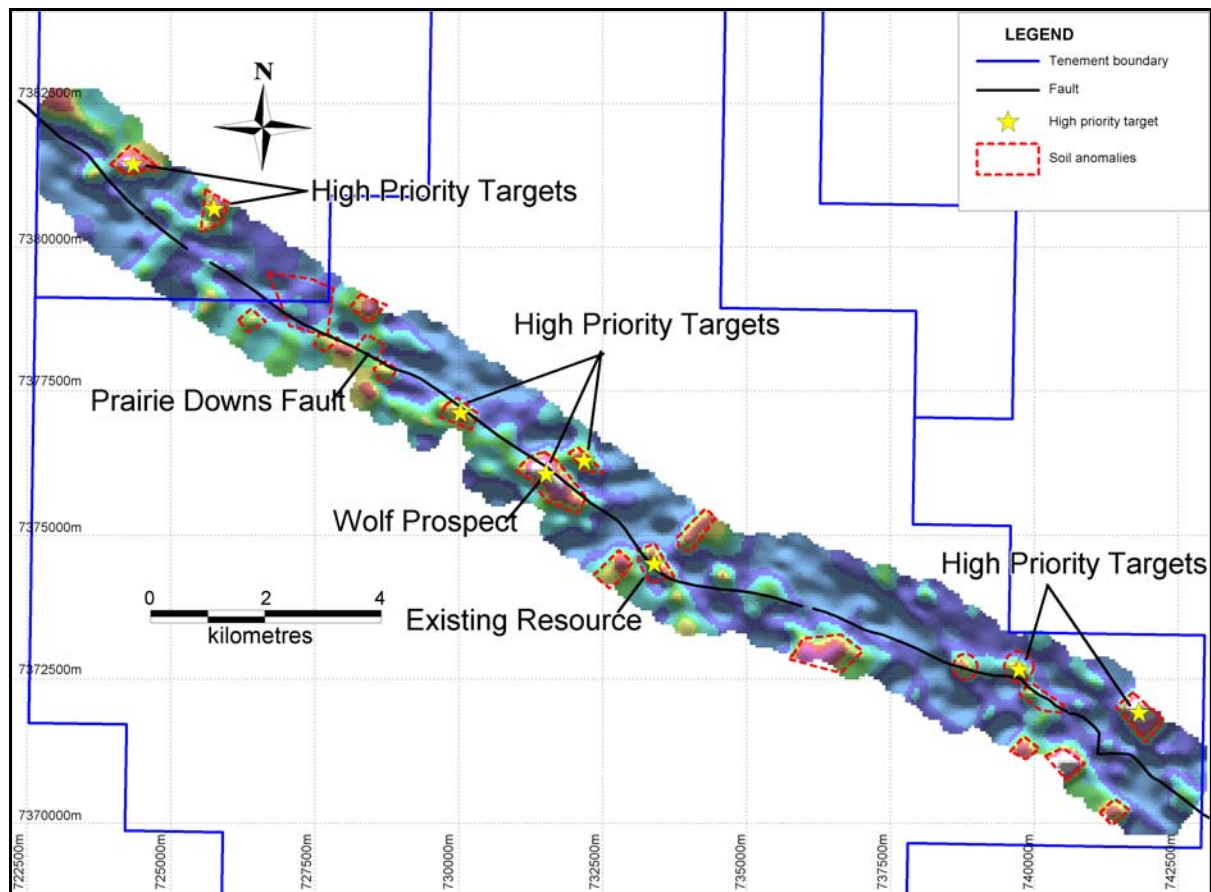


Figure 1: Location of the soil geochemical survey samples overlying the Prairie Downs Fault.

The interpreted geochemical data (see Figure 2) shows high priority ranked targets occurring intermittently along 20 km of the 23.5 km of strike length tested and highlight the prospectivity of the Prairie Downs Fault (PDF). The interpreted high priority targets are found within footwall and hangingwall positions of the PDF as well as along the fault trace suggesting the extent of base metal anomalism is not restricted solely to the PDF. Several areas of lower priority anomalism, particularly within the south-eastern footwall, are the result of an anomalous value from the last sample of the line. Extending the sampling on these lines may improve the ranking of these anomalies.



KEY TARGETS

As discussed above, the soil geochemical survey has identified a number of high priority targets. One of the most exciting of these is the renamed Wolf Prospect (formerly Kerr's Find) located 2km WNW of the current Prairie Downs Main Lode resource. Figure 3 compares the relative size and level of anomalism of the Wolf Prospect anomaly to the anomaly overlying the existing Global Resource (currently at 4.7 Mt @ 8.1 Zn+Pb). The relatively discrete character of the Main Lode anomaly indicates that any one of the high priority anomalies identified in the survey has the potential to replicate this existing resource.

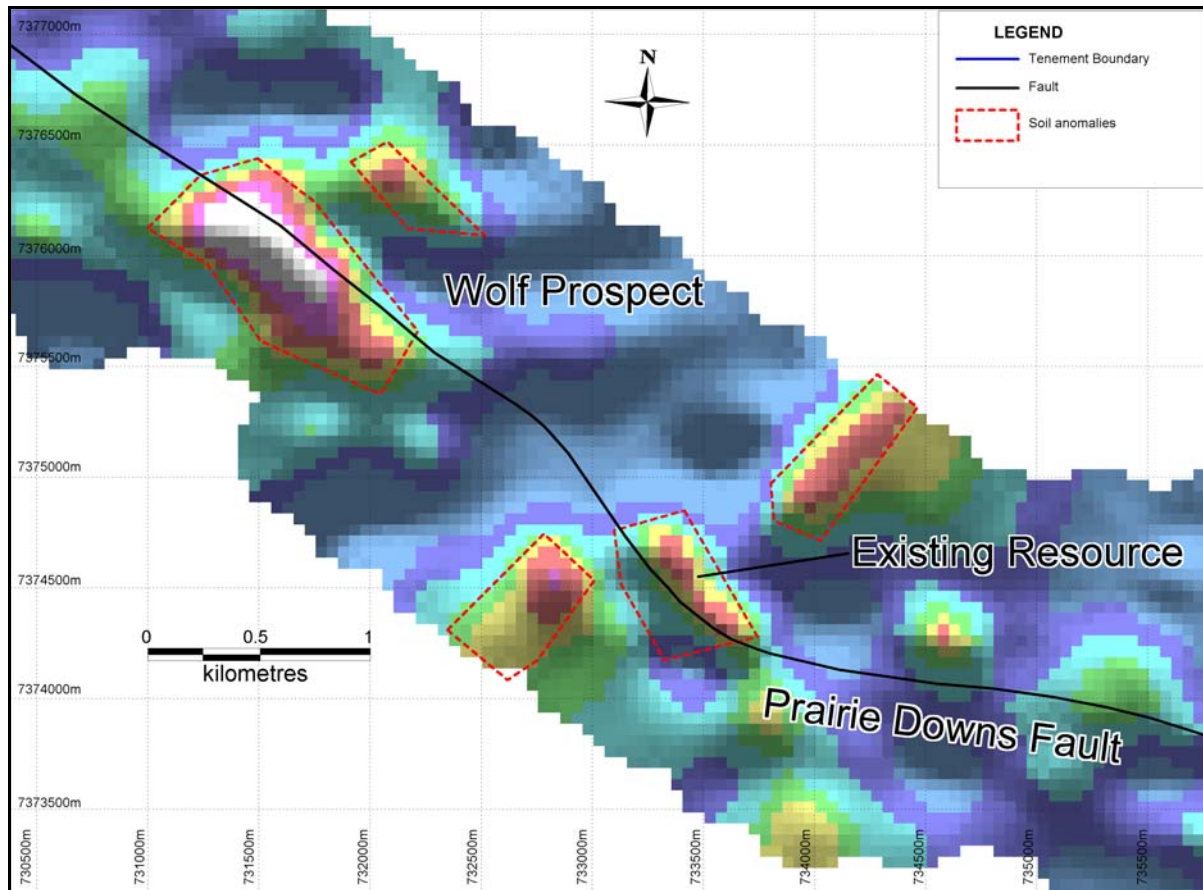


Figure 3: The Wolf Prospect anomaly compared to the Prairie Downs Main Lode anomaly located on the Prairie Downs Fault.

Existing drilling on the Prairie Downs Fault has focussed on a 1.2 km section of the PDF encompassing the Global Resource area. In addition, only 40 holes have been drilled beyond the confines of the existing resource and most of these have targeted the mapped Prairie Downs Fault trace at the Wolf Prospect (See Figure 4). The limited drilling at the Wolf Prospect has not yet properly tested the potential for further mineralisation. Significantly, the area of geochemical anomalism occurs predominantly in the footwall of the fault and overlies a strong coincident gradient array chargeability anomaly. No drilling has occurred in the locations of the remaining 6 high priority targets. One of these high priority anomalies in the ESE extent of the project area has produced coincident IP anomalies further enhancing the prospectivity of this wholly untested target.

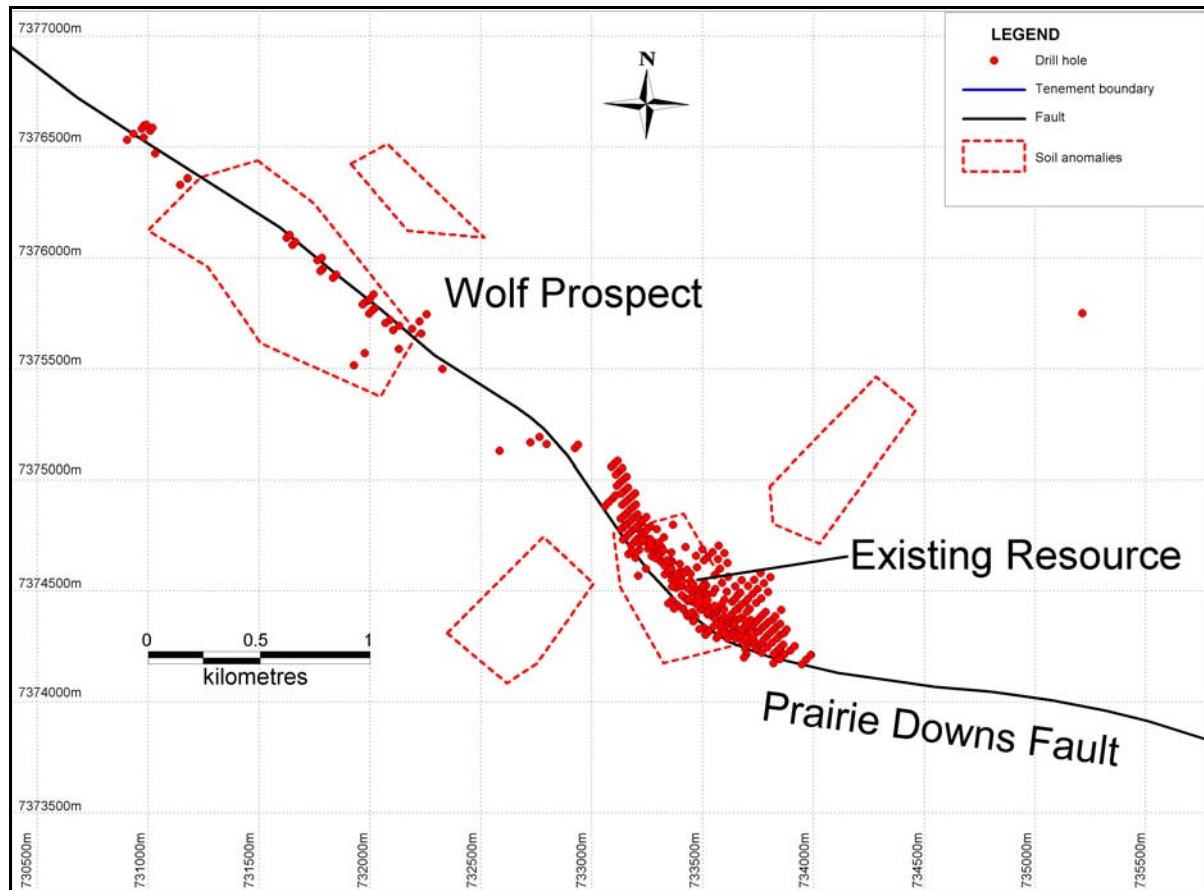


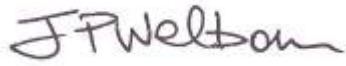
Figure 4: Locations of Wolf and main Lode anomalies and locations of drill hole collars.

FUTURE EXPLORATION FOCUS

Several of the high priority anomalies identified from the first pass geochemical soil survey require further infill geochemical sampling. A reverse air blast (RAB) rig will be employed to sample the base of transported material in areas of cover and lag sampling will be used in areas of residual soils. The purpose of this infill work is to test the validity of the anomalies using conventional analytical techniques and to further delineate the lateral extent of the identified anomalies. The follow-up geochemical sampling program will also extend the sample grid over locations where anomalous assay values were detected in the end of line samples.

The chargeability anomaly in the footwall of the Wolf prospect requires further geophysical evaluation to assess the depth of this anomaly prior to drill testing.

Subject to confirmation of the validity of the targets an ensuing RC drilling program to test the remaining high priority targets will be commissioned.



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Information in this report that relates to Exploration Results or Mineral Resources is based on information compiled by Mr David Kelly who is a Member of The Australasian Institute of Mining and Metallurgy. Mr Kelly has sufficient experience which is relevant to the style of mineralisation and type of deposit under consideration and to the activity which they are undertaking to qualify as a Competent Persons as defined in the 2004 Edition of the 'Australasian Code for Reporting of Exploration Results, Mineral Resources and Ore Reserves'. Mr Kelly consents to the inclusion in this report of the statements based on their information in the form and context in which it appears.

PRAIRIE DOWNS BASE METALS PROJECT OVERVIEW

As previously published the Project hosts a total global inferred and indicated resource of 4.7 million tonnes at a grade of 6.3% zinc, 18g/t silver and 1.8% lead at a nominal lower cut off grade of 1% zinc ("the Global Resource" - refer to Table 1.0 attached). This resource contains 295,000 tonnes of zinc, 2.6 million ounces of silver and 83,000 tonnes of lead. Included is a high grade indicated and inferred resource of 1.6 million tonnes at a grade of 12.3% zinc, 36g/t silver and 3.7% lead.

The Project is located approximately 60 kilometres southwest of Newman in the Eastern Pilbara region of Western Australia and is therefore proximal to significant infrastructure including rail, road and gas pipeline. Furthermore, Newman is a hub for mining activity providing expertise and supplies to many significant operations.

The Prairie Downs Base Metals Project is surrounded by actively explored prospects held by, amongst others, Rio Tinto Ltd, BHP Billiton Ltd, Fortescue Metals Group Ltd, Ausquest Ltd, U₃O₈ Ltd, Warwick Resources Ltd, Independence Group NL and Dynasty Metals Australia Ltd. Exploration activity of these companies is focused upon iron ore, gold, uranium and base metals.

Prairie Downs Project Location Plan

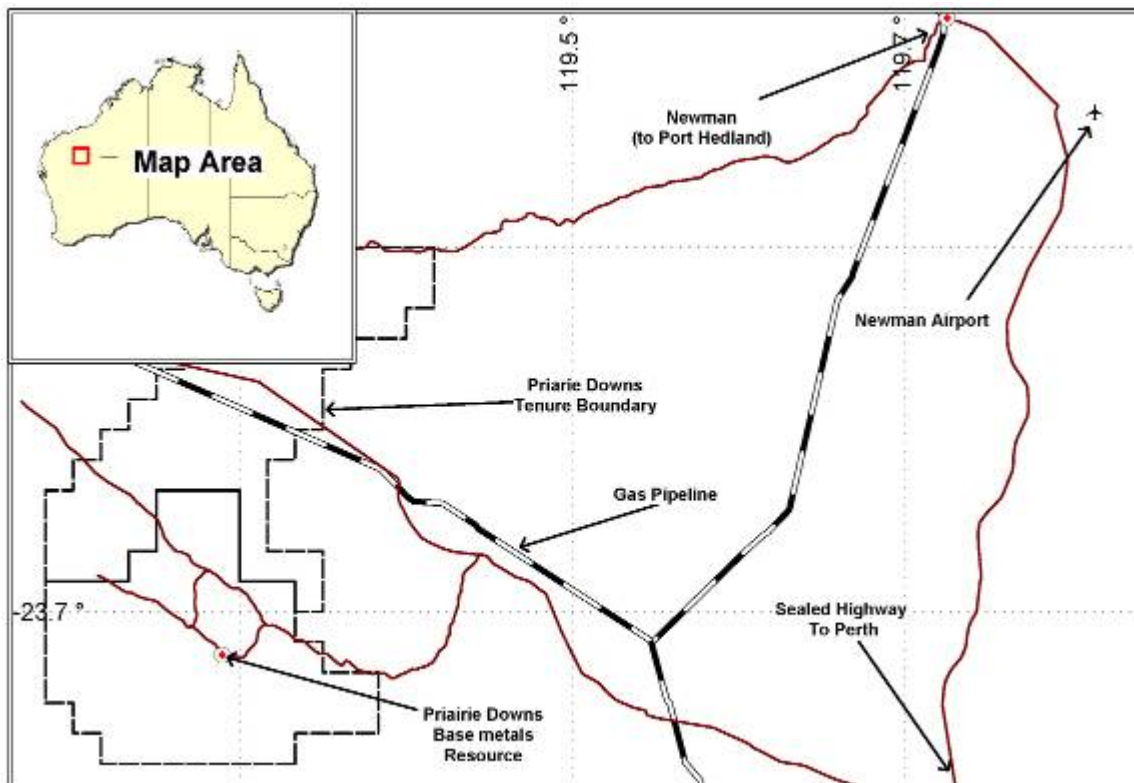


Table 1**RESOURCE STATEMENT**

The resource statement provides the classification of the Global Resources including the Indicated Resource and Inferred Resource for the respective lodes.

Category	Tonnes	Zinc (%)	Lead (%)	Silver (g/t)	Zinc Metal (tonnes)	Lead Metal(tonnes)	Silver Metal (ounces)
Global Indicated	2,257,835	7.7%	2.1%	22	174,350	47,332	1,612,981
Global Inferred	2,397,223	5.0%	1.5%	13	120,635	36,093	1,017,900
High Grade Indicated	1,116,283	12.9%	3.6%	33	144,414	40,742	1,191,942
High Grade Inferred	529,805	10.9%	3.8%	42	57,544	20,020	720,319
High Grade Total	1,646,088	12.3%	3.7%	36	201,958	60,762	1,912,261
Global Total	4,655,058	6.3%	1.8%	18	294,985	83,425	2,630,881