

Statement of Reasons

KGL RESOURCES – JERVOIS BASE METAL PROJECT NOTICE OF AN ALTERATION – CLAUSE 14(A)

PROJECT

The Northern Territory Environment Protection Authority (NT EPA) decided on 25 February 2014 that KGL Resources' (the Proponent) Jervois Base Metal Project (the Project) requires assessment under the *Environmental Assessment Act* at the level of an Environmental Impact Statement (EIS).

The Proponent wrote to the NT EPA on 25 January 2017 to provide notice of an alteration to the Project under clause 14A of the Environmental Assessment Administrative Procedures (EAAP).

The Proponent proposes to commence open pit and underground mining and ore processing at the Project, located approximately 270 km east-north-east of Alice Springs. The Project tenements have been the subject of historic exploration and mining by various operators since 1929. The original referral outlined the proposal to mine copper and other base metals from four new and existing open pits and three new underground mines. Ore would be processed onsite using standard flotation to produce copper sulphide concentrate. The concentrate would be transported in truck containers via a haul road and the Plenty and Stuart Highways to the Alice Spring rail terminal. Concentrate would be subsequently transported by rail to Darwin for export.

The Project infrastructure would include workshops, laydown areas, an explosive magazine, offices, warehouses, a laboratory, haul roads, sewage treatment systems, 12 MW diesel and/or gas fired power station, powerlines, water storages, an airstrip and accommodation camp. It is estimated that the workforce would peak at approximately 110 staff during full production of underground and open cut operations and would operate on a fly-in fly-out basis.

In 2014, the NT EPA identified the potential impacts to regional water resources, potential social, cultural and economic impacts, and the risk to the value status and condition of the Jervois Range, contributed to the decision to assess the Project at the level of an EIS.¹ The Project was also considered likely to increase demand and/or impact on existing services and infrastructure, including road, railway and air transport networks.

Altered Project

The Proponent initially estimated a combined mineral resource of 13.7 Mt from the Reward, Green Parrot, Bellbird and Bellbird North deposits at the Project. Subsequent exploration and resource characterisation works have confirmed a larger than predicted mineral multi-element resource of 30.5 Mt, which includes the identification of high-grade copper, lead and zinc mineralisation at the Rockface deposit. The deposit is located to the south of the Project area and has not been mined previously.

The confirmation of a large, multi-element mineral resource has enabled the Proponent to propose extending the mine life from seven years to up to 15 years and to introduce new mining and processing to produce lead and zinc concentrate. Two new tailings cells and additional roads, pits and waste rock dumps would be required to accommodate the altered Project, enlarging the overall Project footprint from 675 to 970 ha. The Proponent also proposes the option to transport lead and zinc concentrate to Adelaide for refining and export.

¹ Northern Territory Environment Protection Authority, 2014. *Statement of Reasons – KGL Resources – Jervois Base Metal Project.* Northern Territory Environment Protection Authority, Darwin, Australia.

the NT EPA. The NT EPA considers that the concurrent mining and production of copper, lead and zinc and management practices would still have the potential to significantly impact the quality of regional water resources and that the environmental significance of the Project has not changed.

Extending the life of mine and water resources

The altered Project would increase the raw water requirements from 7 GL to 18 GL, at an estimated extraction of 50 L/s, for the life of the Project. The Proponent identified that a site water balance indicated a water deficit and that additional water supplies would need to be investigated, including the extraction of water from bores at Jervois Station (pastoral use) and using an existing dam as an additional water source. The extension of the life of mine to 15 years and increasing the estimated water extraction from 43 to 50 L/s to support the altered Project has the potential to deplete the groundwater aquifers and impact on the recovery potential of regional groundwater aquifers. In an area of water scarcity, restricted or diminished access to water from existing water users has the potential to have broader social, economic and cultural impacts that have yet to fully be scoped by the Proponent.

The NT EPA considers that the water requirements to support the altered Project are still significant and that the potential social, economic and cultural impacts from the altered Project are consistent to those initially referred to the NT EPA.

Conclusion

In considering the above, the NT EPA concludes that the alterations will not reduce the significance of the potential environmental impacts and risks arising from the Project. The environmental significance of the altered Project has not changed and remains such that an EIS is required. The altered Project will continue to be assessed at the level of an EIS.

DECISION

The Project has been altered in such a manner that its environmental significance has not changed and an EIS is necessary with respect to the proposed action.

DR PAUL VOGEL

CHAIRMAN

NORTHERN TERRITORY ENVIRONMENT PROTECTION AUTHORITY

1 MARCH 2017