

Application of metallogenic geologic body volume method in the lead-zinc resource potential assessment of Wulian Qibaoshan area, Shandong Province

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Abstract: In the evaluation of mineral resources potential in Qibaoshan area, Qibaoshan lead-zinc deposit is selected as typical deposit, the model areas are defined. The minimum prediction area is defined by comprehensive metallogenic information, includes: large scale geology, geochemistry, geophysical and remote equalization. The Ore-bearing geologic body volume method is used to improve the reliability of mineral prediction results. The algorithm is: the calculated mineral resources = minimum appraisal area \times dip extension \times area parameters of the ore-bearing geological body \times similarity coefficient \times ore-bearing coefficient of the model area. A total of 1,126,900 t of lead and zinc resources above 1000 m were predicted. The predicted resources in the depth and periphery of typical deposits are taken as the total resources in the model area to further improve the accuracy of the ore-bearing coefficient in the model area and make the predicted results more reasonable and reliable.

Key words: lead-zinc deposit, ore-bearing geological body volume method, resource potential assessment, Wulian area, Shandong Province

派拉蒙黄金内华达公司简介

派拉蒙黄金内华达公司(Paramount Gold Nevada)是一家专注于开发俄勒冈州 Grassy Mountain 项目的公司。2020年1月,该公司宣布,在2019年11月份向俄勒冈州有关部门提交建设和运营该矿的综合许可证申请之后,目前已经获得了运营该矿所需的水资源许可。

根据现有检测量显示,Grassy Mountain 的资源为2800万吨,每吨分别含金1.17克和银3.67克,共计金106万盎司、银320万盎司。Ausenco正在对该项目进行可行性研究,并将收到公司110万股受限制普通股的付款,托管至最终可行性报告出炉,预计在2020年公布。

该项目2018年的前期可行性研究显示,一个地下矿在7年的开采周期内,平均每年生产4.7万盎司黄金和5万盎司白银,现金运营成本为每盎司528美元,计算出来的净现值估计值(折扣率为5%)为8780万美元,内部收益率为27.6%;初始资本成本总额为1.1亿美元,用于每天680吨的采矿和碾磨作业。

派拉蒙公司在内华达州北部还拥有—个需要唤醒的项目——生产多年的露天矿。据了解,该项目是一个30000吨/日的堆浸露天矿坑,平均每年生产92400盎司的黄金和91800盎司的白银,5%的贴现率,税后净现值估计为1.26亿美元。目前,进一步的勘探、许可和冶金试验工作正在进行中。

在勘探方面,派拉蒙公司计划完成北斯波·丹尼斯·弗利和沃利·伍德目标的后续钻探工作,所有这些目标都位于距草木矿床3.2千米的范围内。额外的目标包括Crabgrass和Bluegrass。Crabgrass的特点是具有历史意义的资源估计,而过去曾在Bluegrass的钻探中获得了浅层金矿化。该公司于2016年收购了Grassy Mountain项目。

派拉蒙黄金内华达公司的市值为2800万美元。

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