*A copy of this preliminary short form prospectus has been filed with the securities regulatory authorities in each of the provinces of Canada, except Quebec, but has not yet become final for the purpose of the sale of securities. Information contained in this preliminary short form prospectus may not be complete and may have to be amended. The securities may not be sold until a receipt for the short form prospectus is obtained from the securities regulatory authorities.*

*No securities regulatory authority has expressed an opinion about these securities and it is an offence to claim otherwise. This short form prospectus constitutes a public offering of these securities only in those jurisdictions where they may be lawfully offered for sale and therein only by persons permitted to sell such securities.*

***Information contained herein is subject to completion or amendment. A registration statement relating to these securities has been filed with the United States Securities and Exchange Commission. These securities may not be sold, nor may offers to buy be accepted, in the United States prior to the time the registration statement is declared effective by the United States Securities and Exchange Commission. This preliminary short form prospectus shall not constitute an offer to sell or the solicitation of an offer to buy, nor shall there be any sale of these securities in any state in which such offer, solicitation or sale would be unlawful prior to registration or qualification under the securities laws of any such state.***

***Information has been incorporated by reference in this prospectus from documents filed with securities commissions or similar authorities in Canada.*** *Copies of the documents incorporated herein by reference may be obtained on request without charge from the Chief Financial Officer and Corporate Secretary of Bunker Hill Mining Corp. at our head office located at 82 Richmond Street East, Toronto, Ontario, Canada, M5C 1P1 (telephone (604) 779-2461), and are also available electronically at www.sedar.com.*

New Issue November 21, 2022

**PRELIMINARY SHORT FORM PROSPECTUS**

# BUNKER HILL MINING CORP.

## Minimum Offering C$7,000,000 (● Common Shares)

## Maximum Offering C$12,000,000 (● Common Shares)

This short form prospectus (the "**Prospectus**") qualifies the distribution of a minimum (the "**Minimum Offering**") of ● shares of common stock (the "**Offered Shares**") of Bunker Hill Mining Corp. ("**Bunker Hill**" or the "**Company**") and a maximum of ● Offered Shares (the "**Maximum Offering**", and together with the Minimum Offering, the "**Offering**") at an offering price of C$● per Offered Share (the "**Offering Price**") for minimum aggregate gross proceeds of C$7,000,000 and maximum aggregate gross proceeds of C$12,000,000. The Offered Shares are being offered and sold pursuant to the terms of an agency agreement (the "**Agency Agreement**") dated ●, 2022 among Bunker Hill, Echelon Wealth Partners Inc. ("**Echelon**"), as co-lead agent and co-bookrunner, Roth Capital Partners, LLC ("**Roth**" and, together with Echelon, the "**Lead Agents**"), as co-lead agent and co-bookrunner, and Laurentian Bank Securities Inc. ("**Laurentian**" and, together with the Lead Agents, the "**Agents**"), as co-manager. See "*Plan of Distribution*".

**Price: C$● per Offered Share**

| | Price to the Public | Agents' Commission[(1)] | Net Proceeds to the Company[(2)] |
|---|---|---|---|
| Per Offered Share | C$● | C$● | C$● |
| Minimum Offering[(3)] | C$7,000,000 | C$420,000 | C$6,580,000 |
| Maximum Offering[(3)] | C$12,000,000 | C$720,000 | C$11,280,000 |

Notes:

(1) Assumes no sales to person on the President's List (as defined herein) or sales to Company Purchasers (as defined herein). In consideration of the services rendered by the Agents in connection with the Offering, Bunker Hill has agreed to pay the Agents a commission (the "**Agents' Commission**") equal to 6.0% of the gross proceeds of the Offering, subject to a reduced fee equal to: (i) 3.0% for Offered Shares sold to certain purchasers designated by the Company on a president's list (the "**President's List**"); and (ii) 2.0% for Offered Shares sold to Valuestone Global Resource Fund I, management, the board of insiders of the Company ("**Company Purchasers**"). In addition the Agents will receive such number of compensation warrants (the "**Compensation Warrants**") as is equal to 6.0% of the number of Offered Shares issued pursuant to the Offering, including any Offered Shares sold on the exercise of the Over-Allotment Option (as defined herein), subject to a reduced number of Compensation Warrants equal to: (i)

3.0% for Offered Shares sold to investors on the President's List; and (ii) 2.0% for Offered Shares sold to Company Purchasers. Each Compensation Warrant shall be exercisable to acquire one share of common stock of the Company (a "**Compensation Warrant Share**") at an exercise price of $● per Compensation Warrant Share, for a period of 24 months following the Closing Date (as defined herein), subject to adjustment in certain events. The Company has also agreed to reimburse the Agents for reasonable expenses incurred in connection with the Offering**,** including reasonable legal fees and reasonable out of pocket expenses. See "*Plan of Distribution*".

(2) After deducting the Agents' Commission (assuming no President's List sales or sales to Company Purchasers) but before deducting the expenses related to this Offering, estimated at C$0.4 million, which, together with the Agents' Commission, will be paid by Bunker Hill from the proceeds of the Offering. See "*Use of Proceeds*".

(4) The Company has granted the Agents an option (the "**Over-Allotment Option**"), exercisable in whole or in part in the sole discretion of the Agents at any time and from time to time up to 30 days from and including the Closing Date, to purchase up to an additional number of Offered Shares (the "**Additional Offered Shares**") as is equal to 15% of the number of Offered Shares sold pursuant to the Offering, at the Offering Price, to cover over-allocations, if any, made by the Agents and for market stabilization purposes. A person who acquires Offered Shares forming part of the Agents' over-allocation position acquires those securities under this Prospectus regardless of whether the Agents' over- allocation position is ultimately filled through the exercise of the Over-Allotment Option or secondary market purchases. If the Over-Allotment Option is exercised in full, the total Price to the Public, the Agents' Commission and the Net Proceeds to the Company (before deducting the expenses of the Offering and assuming no President's List sales or sales to Company Purchasers) will be approximately C$8 million, C$0.5 million and C$7.6 million, respectively, if the Minimum Offering is achieved, and approximately C$13.8 million, C$0.8 million and C$13 million, respectively, if the Maximum Offering is achieved. This Prospectus also qualifies the distribution of the Over-Allotment Option and the issuance of the Additional Offered Shares pursuant to the exercise of the Over-Allotment Option. See "*Plan of Distribution*".

The following table sets out the number of Common Shares (as defined herein) that may be issued by the Company in connection with the Over-Allotment Option:

| Agents' Position | Maximum Number of Securities | Exercise Period | Exercise Price |
|---|---|---|---|
| ***Over-Allotment Option*** | | | |
| Minimum Offering | ● Common Shares | Any time up to 30 days after the Closing Date | C$● per Common Share |
| Maximum Offering | ● Common Shares | | |

Unless the context otherwise requires, all references to the "Offering" and the "Offered Shares" in this Prospectus shall include the Over-Allotment Option and the Additional Offered Shares, respectively.

**There is no underwriter involved in the Offering and the Offering has not been underwritten or guaranteed by any person.** The Offering Price was determined by arm's length negotiations between the Company and Echelon, on behalf of the Agents. The Agents, as principals, will conditionally offer the Offered Shares on a commercially reasonable "best efforts" basis, subject to prior sale, if, as and when issued by Bunker Hill and accepted by the Agents in accordance with the conditions contained in the Agency Agreement referred to under "*Plan of Distribution*" and subject to the approval of certain legal matters on behalf of the Company by Blake, Cassels & Graydon LLP ("**Blakes**") and on behalf of the Agents by DLA Piper (Canada) LLP ("**DLA Canada**").

Subject to applicable laws, the Agents may, in connection with the Offering, effect transactions which stabilize or maintain the market price of the Common Shares (as defined herein) at levels other than those which might otherwise prevail on the open market. Such transactions, if commenced, may be discontinued at any time. The Agents may offer the Offered Shares at a price lower than that stated above. See "*Plan of Distribution*".

The shares of common stock of Bunker Hill (the "**Common Shares**") are listed for trading on the Canadian Securities Exchange (the "**CSE**") under the trading symbol "BNKR" and on the OTCQB Venture Market (the "**OTCQB**") under the symbol "BHLL". The closing price of the Common Shares on November 18, 2022, being the last trading day of the Common Shares prior to filing this Prospectus, was C$0.18 on the CSE, and $0.13 on the OTCQB.

**Concurrently with the filing of this Prospectus with the securities commissions or similar authorities in Canada, the Company has filed a registration statement on Form S-1 with the United States Securities and Exchange Commission (the "SEC") with respect to the distribution of the Offered Shares in the United States, which has not yet been declared effective by the SEC. The Offered Shares may not be sold, nor may offers to buy be accepted, in the United States prior to the time the Offered Shares are registered in the United States. See "*Plan of Distribution*".**

Roth is not registered to sell securities in any Canadian jurisdiction and, accordingly, will only sell Offered Shares outside of Canada.

**An investment in the securities offered hereunder should be considered speculative due to various factors, including the nature of the Company's business. The risk factors outlined or incorporated by reference in this Prospectus should be**

**carefully reviewed and considered by prospective purchasers. See "*Cautionary Note Regarding Forward-Looking Statements*" and "*Risk Factors*".**

Prospective purchasers should be aware that the acquisition or disposition of securities described herein may have tax consequences in Canada and in the United States. This Prospectus may not describe these tax consequences fully. **Prospective purchasers should rely on their own tax advisors with respect to their own particular circumstances**. See "*Certain Canadian Federal Income Tax Considerations".*

Subscriptions for the Offered Shares will be received subject to rejection or allotment in whole or in part and the right is reserved to close the subscription books at any time without notice. Provided that the Minimum Offering is met, it is expected that the closing of the Offering (the "**Closing**") will take place on or about ●, 2022, or such other date as may be agreed upon by the Company and the Lead Agents, but in any event not later than 90 days following the date of a final receipt for this Prospectus (the "**Closing Date**"). Pending closing of the Offering, all subscription funds will be deposited and held by the Agents in trust. If the Minimum Offering is not met or the Closing Date does not occur within 90 days from the date a receipt is issued for the (final) short form prospectus or such other time as may be permitted by applicable securities legislation and consented to by persons or companies who subscribed within that period and the Agents, the Offering will be discontinued and all subscription monies will be returned to purchasers without interest, set-off or deduction. See "*Plan of Distribution*" and "*Use of Proceeds*".

Except in certain limited circumstances, it is expected that one or more global certificates (in physical or electronic form) evidencing the Offered Shares distributed under this Prospectus in Canada will be issued in registered form to CDS Clearing and Depository Services Inc. ("**CDS**") or the Depository Trust Company ("**DTC**"), as applicable, and will be deposited with CDS, DTC or their nominee, as applicable, on the Closing Date. No certificates evidencing the Offered Shares will be issued to Canadian resident purchasers, except in certain limited circumstances (including, without limitation, as described below), and registration of such securities will be made in the depository service of CDS or DTC, as applicable. Canadian resident purchasers of Offered Shares will receive only a customer confirmation from the Agents or other registered dealer who is a CDS or DTC participant, as applicable, and from or through whom a beneficial interest in the Offered Shares is purchased. See "*Plan of Distribution*".

Sam Ash, President, Chief Executive Officer and director of the Company, Cassandra Joseph and Pamela Saxton, both directors of the Company, reside outside of Canada and have appointed the following agent for service of process in Canada:

| Name of Person | Name and Address of Agent |
|---|---|
| Sam Ash, Cassandra Joseph, and Pamela Saxton | Blakes Vancouver Services Inc., c/o Blake, Cassels & Graydon LLP, 595 Burrard Street, P.O. Box 49314, Suite 2600, Three Bentall Centre, Vancouver, British Columbia, V7X 1L3, Canada |

Scott Wilson and Robert "Chip" Todd, two of the authors of the Technical Report (as defined herein), also reside outside of Canada. Purchasers are advised that it may not be possible for investors to enforce judgements obtained in Canada against any person or company that is incorporated, continued or otherwise organized under the laws of a foreign jurisdiction, or resides outside of Canada, even if the party has appointed an agent for service of process.

In this Prospectus, unless the context otherwise requires, references to "we", "us", "our" or similar terms, as well as references to "Bunker Hill" or the "Company", refer to Bunker Hill Mining Corp. together with our subsidiary. Unless the context otherwise requires, references to "Offered Shares" includes Additional Offered Shares and references to "Common Shares" include all of the shares of common stock in the Company. Bunker Hill's head office is located at 82 Richmond Street East, Toronto, Ontario, M5C 1P1, Canada. The Company's registered office is located at 701 S. Carson Street, Suite 200, Carson City Nevada, 89701, USA.

Investors should rely only on the information contained in or incorporated by reference into this Prospectus. The Company and the Agents have not authorized anyone to provide investors with different information from that contained or incorporated by reference in this Prospectus. Neither the Company nor the Agents are making an offer of these securities in any jurisdiction where the offer is not permitted. Investors should not assume that the information contained in this Prospectus is accurate as of any date other than the date on the front of this Prospectus. The Company's business, operating results, financial condition and prospects may have changed since that date.

All financial information contained in this Prospectus and the documents incorporated by reference herein is presented in conformity with U.S. GAAP.

**No Canadian securities regulator nor the SEC nor any U.S. state has approved or disapproved of the securities offered hereby, passed upon the accuracy or adequacy of this Prospectus or determined if this Prospectus is truthful or complete. Any representation to the contrary is a criminal offence.**

**The Company is neither a "connected issuer" nor a "related issuer" of the Agents as defined in National Instrument 33-105 – *Underwriting Conflicts*.**

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## ELIGIBILITY FOR INVESTMENT

In the opinion of Blakes, counsel to the Company, and DLA Canada, counsel to the Agents, based on the provisions of the *Income Tax Act* (Canada) and the regulations thereunder (collectively, the "**Tax Act**"), as of the date hereof, the Offered Shares if issued on the date hereof, will be "qualified investments" under the Tax Act for trusts governed by registered retirement savings plans ("**RRSPs**"), registered retirement income funds ("**RRIFs**"), deferred profit sharing plans, registered education savings plans ("**RESPs**"), registered disability savings plans ("**RDSPs**") and tax-free savings accounts ("**TFSAs**") (each, a "**Registered Plan**"), provided that the Offered Shares are listed on a "designated stock exchange", as defined in the Tax Act (which currently includes the CSE).

Notwithstanding that the Offered Shares may each be a qualified investment for a trust governed by an RRSP, RRIF, RESP, TFSA or RDSP, the annuitant of an RRSP or RRIF, the subscriber under an RESP or the holder of a TFSA or RDSP, as the case may be, will be subject to a penalty tax in respect of Offered Shares held in the trust governed by the RRSP, RRIF, RESP, TFSA or RDSP if such Offered Shares are a "prohibited investment" (as defined in the Tax Act) for the particular RRSP, RRIF, RESP, TFSA or RDSP. Provided that for purposes of the Tax Act the annuitant of an RRSP or RRIF, the holder of a TFSA or RDSP or subscriber of a RESP, as the case may be, deals at arm's length with the Company and does not have a "significant interest" (as defined in the Tax Act for purposes of the prohibited investment rules) in the Company, the Offered Shares will not be a "prohibited investment" for such RRSPs, RRIFs, RDSPs, TFSAs and RESPs, as the case may be, under the Tax Act on the date hereof. In addition, the Offered Shares will not be a prohibited investment if such securities are "excluded property" as defined in the Tax Act, for an RRSP, RRIF, RDSP, TFSA or RESP. **Purchasers who intend to hold Offered Shares in an RRSP, RRIF, TFSA, RDSP, or RESP should consult their own tax advisors to ensure the Offered Shares would not be a prohibited investment in their particular circumstances.**

Based on the Proposed Amendments to implement tax measures applicable for first home savings accounts ("**FHSAs**") first proposed by the 2022 Federal Budget (Canada), FHSAs and their holders would be subject to the rules described above for Registered Plans for purposes of the Tax Act (such amendments are referred to as the "**FHSA Amendments**"). In particular, pursuant to the FHSA Amendments, the Offered Shares will be qualified investments for a trust governed by an FHSA provided the condition discussed above in relation to Registered Plans is satisfied. In addition, the rules in respect of "prohibited investments" are also expected to apply to FHSAs and the holders thereof. The FHSA Amendments are proposed to come into force on April 1, 2023. **Purchasers who intend to hold Offered Shares in an FHSA should consult their own tax advisors to ensure the Offered Shares would not be a prohibited investment in their particular circumstances.**

## CAUTIONARY NOTE REGARDING FORWARD-LOOKING INFORMATION

Certain statements contained in this Prospectus and any documents incorporated by reference into this Prospectus constitute forward-looking information within the meaning of applicable Canadian securities legislation (collectively, "**forward-looking statements**"). All statements included herein, other than statements of historical fact, are forward-looking statements and are subject to a variety of known and unknown risks and uncertainties which could cause actual events or results to differ materially from those reflected in the forward-looking statements. The forward-looking statements in this Prospectus include, without limitation, statements relating to:

- the size of the Offering, including meeting the Minimum Offering, participation of investors on the President's List or Company Purchasers, the Offering Price and the completion and expected timing of the Offering;
- the receipt of required regulatory approvals (including approval of the CSE) in respect of the Offering;
- the listing of the Offered Shares (including those issuable upon any exercise of the Over-Allotment Option) and the Compensation Warrant Shares on the CSE;
- the proposed use of proceeds of the Offering and available funds of the Company, including achieving business objectives in the time anticipated by the Company;
- the Company's ability to restart production at the Bunker Hill Mine (as defined herein);
- the closing of a stream agreement (the "**Stream Agreement**") between the Company and Sprott Private Resource Streaming and Royalty Corp. ("**Sprott**");
- the planned and future exploration and development on the Bunker Hill Mine and other mineral properties;
- the Company's planned development timeline for the Bunker Hill Mine;
- the Company's goals regarding exploration and potential development of its projects;
- the Company's ability to complete payments under the settlement agreement amendment dated December 19, 2021 with the US Environmental Protection Agency (the "**Amended Settlement**");
- the ability to generate free cash flow from the Bunker Hill Mine;

- expectations generally regarding the ability of the Company to raise further capital;
- the future price of lead, silver, zinc or other metals;
- expectations regarding any environmental issues that may affect planned or future exploration and development programs and the potential impact of complying with existing and proposed environmental laws and regulations;
- the ability to obtain, and/or maintain any required permits, licenses or other necessary approvals for the exploration or development of the Bunker Hill Mine and other mineral properties;
- government regulation of mineral exploration and development operations in Idaho;
- the Company's expected reliance on key management personnel, advisors and consultants;
- the volatility of global financial markets;
- the volatility of the novel coronavirus ("**COVID-19**") outbreak as a global pandemic; and
- the Registration Statement with respect to the Offered Shares being declared effective by the SEC.

Often, but not always, these forward-looking statements can be identified by the use of words such as "anticipates", "believes", "plans", "estimates", "expects", "forecasts", "scheduled", "targets", "possible", "strategy", "potential", "intends", "advance", "goal", "objective", "projects", "budget", "calculates" or statements that events, "will", "may", "could" or "should" occur or be achieved and similar expressions, including negative variations.

Forward-looking statements involve known and unknown risks, uncertainties and other factors which may cause the actual results, performance or achievements of the Company to be materially different from any results, performance or achievements expressed or implied by the forward-looking statements. Such uncertainties and factors include, among others:

- the Company's ability to operate as a going concern is in doubt;
- the Company will require significant additional capital to fund its business plan;
- the closing of the Stream Agreement (as defined herein);
- the securing and closing of the Offtake Financing (as defined herein) or arrange suitable alternative offtake financing;
- mineral exploration and development are inherently risky;
- the Company's plans may be adversely affected by the Company's reliance on historical data compiled by previous parties involved with its mineral properties;
- additional financing may not be available to the Company when required or, if available, the terms of such financing may not be favourable to the Company;
- financial statements have been prepared on a going concern basis;
- compliance with environmental regulations can be costly;
- exploration and development activities are dependent upon the grant of appropriate licenses, concessions, leases, permits and regulatory consents, which may be withdrawn or not granted;
- title to the properties in which the Company has a material interest will not be challenged or impugned or subject to disputes or claims;
- the success of the Company is largely dependent on the performance of its directors and officers;
- the Company and/or its directors and officers may be subject to a variety of legal proceedings, the results of which may have a material adverse effect on the Company's business;
- future profitability may depend upon the world market prices of lead, silver, zinc and other metals;
- the Company's limited operating history and its properties are exploration stage properties;
- operations could be adversely affected by possible future government legislation, policies and controls or by changes in applicable laws and regulations;
- mining exploration may not be insurable or may be the subject of insurance which is not commercially feasible for the Company;
- public health crises such as the COVID-19 pandemic may adversely impact the Company's business;
- the Russia/Ukraine crisis, including the impact of sanctions or retributions thereto, could adversely affect the Company's business;
- the mineral exploration industry is intensely competitive;
- dependence upon capital markets to raise additional financing;
- the price of commodities could have dramatic effects on the results of operations and the Company's ability to execute its business plan;
- metal prices are highly volatile. If a profitable market for its metals does not exist, the Company may have to cease operations;

- there are amounts due and owing under the Company's agreement with the EPA (as defined herein) that have not been paid in accordance with the agreed upon payment schedule. In the event that default is asserted, the Company may lose its ability to exercise its right to purchase the Mine, which would have a material adverse impact on the Company;
- costs charged to the Company for treatment of waste water fluctuate a great deal and are not within the Company's control;
- the Company's exploration activities may not be commercially successful;
- the Company is subject to various risks associated with climate change;
- social and environmental activism can negatively impact exploration, development and mining activities;
- the Company may enter into joint ventures, partnership agreements or offtake agreements;
- the Company may be adversely affected if potential conflicts of interests involving its directors and officers are not resolved in favour of the Company;
- the Company's history of no earnings and negative cash flow from operating since inception;
- compliance with reporting requirements, under applicable securities laws, can increase legal and financial costs making activities more difficult, time consuming and costly;
- the Company may not be able to identify, negotiate or finance any future acquisitions successfully, or to integrate such acquisitions with its current business;
- failure to adequately meet infrastructure requirements could have a material adverse effect on the Company's business;
- the Company's projects now or in the future may be adversely affected by risks outside the control of the Bunker Hill;
- the acquisition of additional mineral properties may not be approved by applicable security exchanges;
- the Company's operations depend on information technology;
- high degree of risk and speculative nature of the Company's securities;
- dilution from future equity financing could negatively impact holders of the Company's securities;
- the Company has not paid any dividends on the outstanding Common Shares;
- Common Shares have experienced substantial volatility in the past;
- market price of the Common Shares may not directly relate to the corporate performance of the Company;
- trading market of the Common shares may be influenced by securities or industry analysts;
- the Company could be delisted from stock exchanges;
- changes in general economic conditions;
- the Company's ability to comply with its debt obligations;
- operating and reclamation costs varying significantly from estimates and the other risks involved in mineral exploration and development industry; and
- other factors discussed under "Risk Factors" or set out in the Company's public disclosure documents filed on SEDAR;

as well as those factors referred to in the "Risk Factors" section in this Prospectus and the documents incorporated by reference.

Forward-looking statements contained in this Prospectus and any documents incorporated by reference are based on the assumptions, beliefs, expectations and opinions of management, including but not limited to:

- the ability to raise any necessary additional capital on reasonable terms to advance exploration and development of the Company's mineral properties;
- future prices of lead, silver, zinc and other metal prices;
- the timing and results of exploration and drilling programs;
- the demand for, and stable or improving price of lead, silver, zinc and other metal prices;
- general business and economic conditions will not change in a material adverse manner;
- the Company's ability to procure equipment and operating supplies in sufficient quantities and on a timely basis;
- the geology of the Bunker Hill Mine as described in the Technical Report;
- the accuracy of budgeted exploration and development costs and expenditures;
- future currency exchange rates and interest rates;
- operating conditions being favourable such that the Company is able to operate in a safe, efficient and effective manner;
- the Company's ability to attract and retain skilled personnel and directors;
- the receipt of governmental, regulatory and third-party approvals, licenses and permits on favourable terms;
- obtaining required renewals for existing approvals, licenses and permits on favourable terms;
- requirements under applicable laws;
- sustained labour stability; stability in financial and capital goods markets;
- the expectations regarding the level of disruption to exploration and development at the Bunker Hill Mine as a result of COVID-19;

- availability of equipment; and
- the Registration Statement being declared effective by the SEC.

Although the Company has attempted to identify important factors that could cause actual actions, events or results to differ materially from those described in forward-looking statements, there may be other factors that cause actions, events or results not to be as anticipated, estimated or intended.

These forward-looking statements are made as of the date of this Prospectus. There can be no assurance that forward-looking statements will prove to be accurate, as actual results and future events could differ materially from those anticipated in such statements. Accordingly, readers are cautioned not to place undue reliance on forward-looking statements, including, without limitation, those referred to in this Prospectus under the heading "*Risk Factors*" and in the Company's Annual Report on Form 10-K (as defined herein) which is incorporated herein by reference. Accordingly, readers and investors should not place undue reliance on forward-looking statements. The Company does not intend to update forward-looking statements, except as required by law.

## NATIONAL INSTRUMENT 43-101

The Company's sole material property is the Bunker Hill mine located in Shoshone County, Idaho, United States (the "**Bunker Hill Mine**"). Unless stated otherwise, information of a scientific or technical nature regarding the Bunker Hill Mine is summarized, derived or extracted from, respectively, the amended and restated technical report dated November 21, 2022 titled "Technical Report and Pre-Feasibility Study for Underground Mining, Milling and Concentration of Lead, Silver and Zinc at the Bunker Hill Mine, Coeur d'Alene Mining District, Shoshone County, Idaho, USA", effective August 29, 2022 (the "**Technical Report**") prepared by Scott Wilson, C.P.G., of Resource Development Associates Inc., Robert Todd, P.E., of Minetech USA LLC, and Peter Kondos, Ph.D., of YaKum Consulting Inc. These authors are independent of Bunker Hill and are independent "Qualified Persons" as defined by National Instrument 43-101 – *Standards of Disclosure for Mineral Projects* ("**NI 43-101**").

The Technical Report has been filed with the Canadian securities regulatory authorities and is available for review at www.sedar.com under the Company's profile. Reference should be made to the full text of the Technical Report for a complete description of assumptions, qualifications and procedures associated with the information in it.

The mineral resource figures referred to in this Prospectus and the documents incorporated therein by reference are estimates and no assurances can be given that the indicated levels of lead, silver and zinc will be produced. Such estimates are expressions of judgment based on knowledge, mining experience, analysis of drilling results and industry practices. Valid estimates made at a given time may significantly change when new information becomes available. By their nature, mineral resource and mineral reserve estimates are imprecise and depend, to a certain extent, upon statistical inferences which may ultimately prove unreliable. Any inaccuracy or future reduction in such estimates could have a material adverse impact on the Company.

## CURRENCY PRESENTATION AND EXCHANGE RATE INFORMATION

Unless otherwise indicated, all references to "$, US$" or "dollars" in this Prospectus refer to United States dollars and all references to "C$" in this Prospectus refer to Canadian dollars.

The following table sets forth the rate of exchange for the United States dollar expressed in Canadian dollars in effect at the end of the periods indicated, the average of exchange rates in effect on the last day of each month during such periods, and the high and low exchange rates during such periods based on the daily average exchange rate as reported by the Bank of Canada for conversion of United States dollars into Canadian dollars.

| | **Quarter Ended September 30,** | **Year Ended December 31,** | |
|---|---|---|---|
| | **2022** | **2021** | **2020** |
| Average rate of period | 1.3056 | 1.2535 | 1.3415 |
| Rate at end of period | 1.3707 | 1.2678 | 1.2732 |
| High for period | 1.3726 | 1.2942 | 1.4496 |
| Low for period | 1.2753 | 1.2040 | 1.2718 |

The daily average exchange rate on November 18, 2022 as reported by the Bank of Canada for the conversion of United States dollars into Canadian dollars was US$1.00 equals $1.3385.

## DOCUMENTS INCORPORATED BY REFERENCE

**Information has been incorporated by reference in this Prospectus from documents filed with securities commissions or similar authorities in Canada.** Copies of the documents incorporated herein by reference may be obtained on request without charge from the Chief Financial Officer of Bunker Hill at 82 Richmond Street East, Toronto, Ontario, Canada, M5C 1P1 (telephone +1 (604) 779-2461) and are also available electronically at www.sedar.com.

The following documents of Bunker Hill filed with the securities commissions or similar authorities in Canada are incorporated by reference in this Prospectus:

(a) our annual report on Form 10-K dated March 31, 2022 for the fiscal year ended December 31, 2021 (the "**Annual Report on Form 10-K**");

(b) our audited consolidated financial statements for the year ended December 31, 2021, together with the notes thereto and the auditor's reports thereon (the "**Annual Financial Statements**");

(c) our managements' discussion and analysis for our financial condition and results of operations for the year ended December 31, 2021 (the "**Annual MD&A**");

(d) our unaudited condensed interim consolidated financial statements for the three and nine months ended September 30, 2022, together with the notes thereto (the "**Interim Financial Statements** and, together with the Annual Financial Statements, the "**Financial Statements**");

(e) our managements' discussion and analysis for the three and nine months ended September 30, 2022 (the "**Interim MD&A**");

(f) the management information circular dated June 28, 2022, relating to the annual general and special meeting of shareholders of Bunker Hill held on July 29, 2022; and

(g) a "template version" (as such term is identified in National Instrument 41-101 – General Prospectus Requirements ("**NI 41-101**")) of the term sheet for the Offering dated November 21, 2022, as filed on November 21, 2022 (the "**Template Term Sheet**");

(h) a "template version" (as such term is identified NI 41-101) of the investor presentation of the Company dated November 21, 2022 as filed on November 21, 2022 (the "**Template Investor Presentation**" and, together with the Term Sheet, the "**Marketing Materials**");

(i) the following material change reports of Bunker Hill filed since December 31, 2021, the end of the Company's most recently completed financial year (collectively, the "**Material Change Reports**"):

(i) dated January 25, 2022, announcing the closing of the purchase of the Bunker Hill Mine and the closing of the $8 million royalty convertible debenture (the "**Royalty Convertible Debenture**");

(ii) dated January 28, 2022, announcing the closing of a convertible debenture financing with Sprott (and other investors) for gross proceeds of $6 million (the "**Convertible Debentures**");

(iii) dated March 7, 2022, announcing the signing of an asset purchase agreement for the purchase of the Pend Oreille process plant from a subsidiary of Teck Resources Limited ("**Teck**");

(iv) dated March 23, 2022, announcing an update on the Bunker Hill Mine restart project and the offering of special warrants and units of the Company (the "**March Private Placement**");

(v) dated April 11, 2022, announcing the closing of the March Private Placement;

(vi) dated May 9, 2022, amending a material change report filed April 11, 2022;

(vii) dated May 31, 2022, announcing the issuance by the Ontario Securities Commission of a receipt for the Company's final short-form prospectus Canadian prospectus and the issuance of a notice from the SEC that the Company's Form S-1 has been declared effective;

(viii) dated June 17, 2022, announcing the closing of a convertible debenture financing with Sprott for total gross proceeds of $15 million;

(ix) dated August 3, 2022, announcing an update on the Bunker Hill Mine restart project;

(x) dated August 11, 2022, announcing the discovery of a previously unknown high-grade silver-lead (Ag/Pb) vein system at the Bunker Hill Mine;

(xi) dated September 6, 2022, announcing the results of a Prefeasibility Study for the first phase of the restart of the Bunker Hill Mine;

(xii) dated September 20, 2022, announcing the procurement by the Company of a ball mill capable of increasing production throughput at the Bunker Hill Mine;

(xiii) dated October 5, 2022, announcing an update on the Bunker Hill Mine restart project;

(xiv) dated October 18, 2022, announcing the filing of an independent Preliminary Feasibility Study for the Bunker Hill Mine in the Silver Valley region of Idaho, USA, the entering into by the Company of a new payment bond to secure a portion of its cost recovery obligations to the US Environmental Protection Agency in connection with the Bunker Hill Mine and the entering into by the Company of a new water management consulting services contract to MineWater LLC for strategic environmental support at the Bunker Hill Mine; and

(xv) dated November 3, 2022, announcing an update on the Bunker Hill Mine restart project.

**Any statement contained in this Prospectus or in a document incorporated or deemed to be incorporated by reference in this Prospectus shall be deemed to be modified or superseded for the purposes of this Prospectus to the extent that a statement contained herein or in any subsequently filed document which also is or is deemed to be incorporated by reference in this Prospectus modifies or supersedes that statement. Any statement so modified or superseded shall not constitute a part of this Prospectus except as so modified or superseded. The modifying or superseding statement need**

**not state that it has modified or superseded a prior statement or include any information set forth in the document that it modifies or supersedes. The making of a modifying or superseding statement shall not be deemed an admission for any purposes that the modified or superseded statement, when made, constituted a misrepresentation, an untrue statement of a material fact or an omission to state a material fact that is required to be stated or that is necessary to make a statement not misleading in light of the circumstances in which it was made.**

Any document of the type required to be incorporated into the Prospectus by item 11.1 of Form 44-101F1 – *Short Form Prospectus* (excluding confidential material change reports and excluding those portions of documents that are not required pursuant to National Instrument 44-101 – *Short Form Prospectus Distributions* to be incorporated by reference herein) filed by the Company after the date of this Prospectus and before the termination of the distribution are deemed to be incorporated by reference in this Prospectus. Copies of the documents incorporated by reference may be obtained without charge from the Chief Financial Officer of the Company at the above-mentioned address and telephone number and are also available electronically on the SEDAR website at www.sedar.com. Information on the Company's website does not constitute part of this Prospectus.

## MARKETING MATERIALS

In connection with the Offering, the Agents used the Marketing Materials as "marketing materials" (as such terms are defined under applicable Canadian securities laws). The Marketing Materials and any "template version" of any "marketing materials" (as such terms are defined in NI 41-101) that are utilized by the Agents in connection with the Offering are not part of this Prospectus to the extent that the contents of the template version of the marketing materials have been modified or superseded by a statement contained in this Prospectus. Any template version of any marketing materials that has been, or will be, filed on SEDAR before the termination of the distribution under the Offering (including any amendments to, or an amended version of, any template version of any marketing materials) is deemed to be incorporated into this Prospectus. The marketing materials can be viewed under the Company's profile on SEDAR at www.sedar.com.

## THE COMPANY

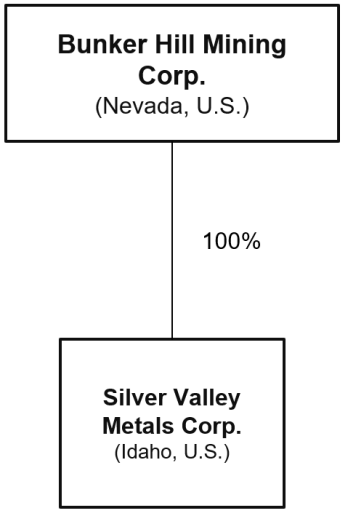
### Incorporation

The Company was incorporated under the *Nevada Revised Statutes, Chapter 78, et seq.* on February 20, 2007, under the name Lincoln Mining Corp. Pursuant to a Certificate of Amendment dated February 11, 2010, the Company changed its name to Liberty Silver Corp., and on September 29, 2017, the Company changed its name to Bunker Hill Mining Corp.

The Company's head office is located at 82 Richmond Street East, Toronto, Ontario, M5C 1P1, Canada. The Company's registered office is located 701 S. Carson Street, Suite 200, Carson City, Nevada, 89701, USA.

### Intercorporate Relationships

As the following chart illustrates, as of the date of this Prospectus, the Company has one wholly-owned subsidiary, Silver Valley Metals Corp. ("**Silver Valley**") (formerly American Zinc Corp.), a corporation, formed in Idaho, created to facilitate the work being done at the Bunker Hill Mine.




**Overview**

Bunker Hill is a mineral exploration and development company engaged in sustainable mineral, exploration and mining activities with its primary focus being the restart of the Bunker Hill lead, silver and zinc mine located in the Silver Valley, Idaho, USA. The Company intends to restart and develop the Bunker Hill Mine in the near future.

Further information regarding the business of the Company, its operations and its mineral property can be found in the Annual Report on Form 10-K and the materials incorporated by reference into this Prospectus. See "*Documents Incorporated by Reference*".

## RECENT DEVELOPMENTS

Since the date of the Annual Report on Form 10-K, in addition to the developments outlined in the Material Change Reports, the Company has had the following developments and/or updates:

**Sprott Financing**

On November 17, 2022, the Company announced that it has received investment committee approval from Sprott for a new $5,000,000 loan facility The loan facility will be utilized for the payment of (a) $3,500,000 to the Environmental Protection Agency (the "**EPA**") for currently outstanding water treatment services for the 2019-2021 period, (b) $560,000 to the Idaho Department of Environmental Quality ("**IDEQ**") for monthly water treatment payments to be made from November 2022 through February 2023, and (c) $940,000 for cost and working capital requirements for the Bunker Hill Mine.

The loan facility will be secured by the security package currently in place between Bunker Hill and Sprott, will bear interest at a rate of 10.5% per annum, and will mature at the earlier of (i) the advance of the multi-metals stream (the "**Stream**") to be advanced pursuant to the Stream Agreement, or (ii) June 30, 2024. In addition, the minimum quantity of metal delivered under the Stream, if advanced, will increase by 5% relative to amounts previously announced. The advance of the loan facility is conditional on the completion of definitive documentation relating to the Stream and the launch of the Offering.

Furthermore, the Company announced that it was finalizing discussions with Sprott regarding the advance of the Stream. Following satisfactory conclusion of the definitive documentation relating to the Stream, full project funding for the Bunker Hill Mine and certain other conditions precedent, the Company expects the advance of the Stream to take place in the first quarter of 2023.

**Concentrate Offtake Financing**

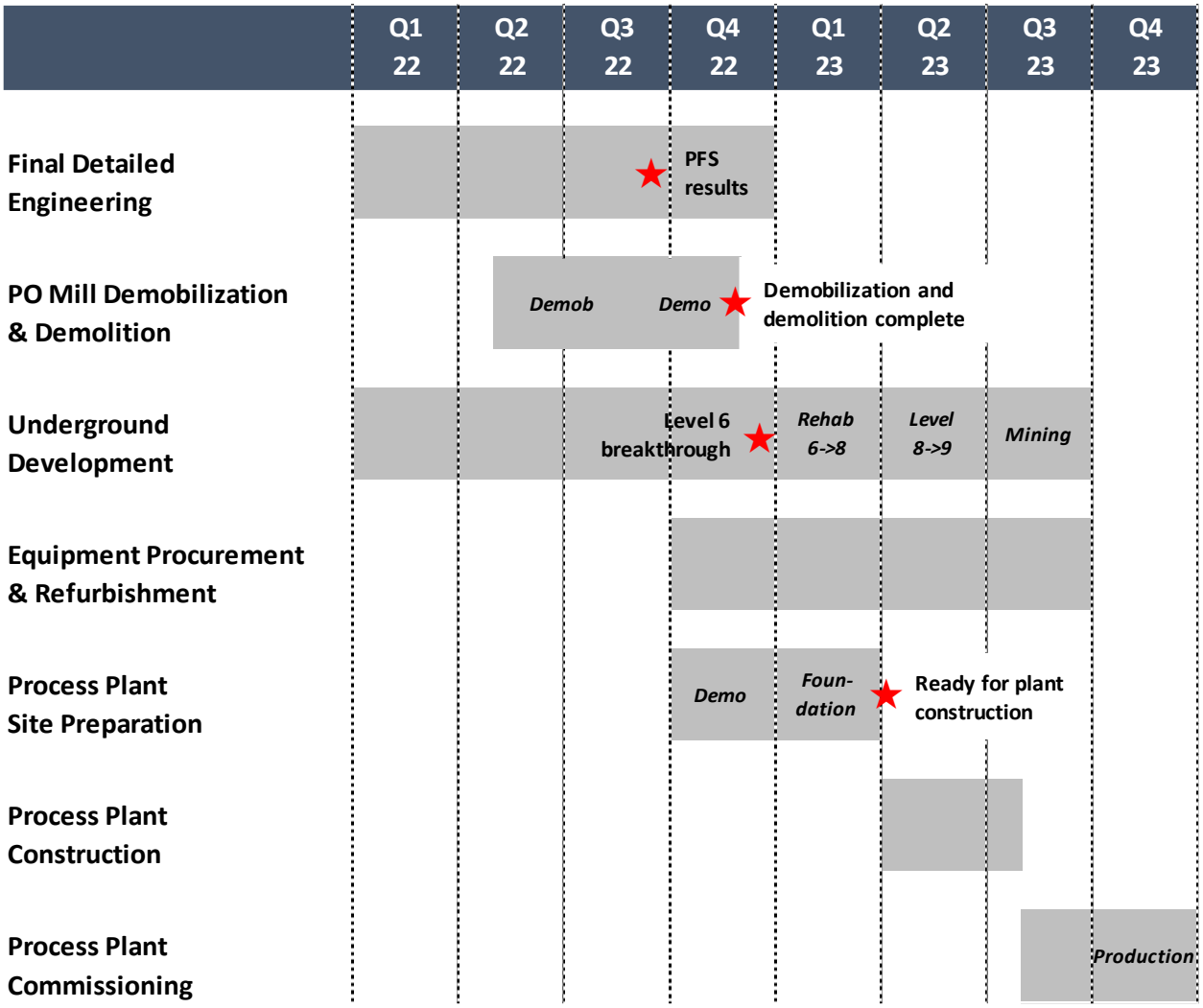
On November 17, 2022, the Company also announced that it was in discussions with Sprott and Teck, as holder of the exclusive option to acquire 100% of zinc and lead concentrate produced in the first five years at the Bunker Hill Mine, to facilitate the potential provision of concentrate offtake financing from third parties as the final tranche of capital to finance the restart of the

Bunker Hill Mine (the "**Offtake Financing**"), alongside the Stream and Offering. The Company further announced that it was evaluating several non-binding term sheets from metals traders envisaging the provision of up to $15 million of offtake finance.

**Updated Development Timeline**

The Company's updated planned development timeline through 2022 and 2023 is shown in Figure A below. For a more detailed description of Bunker Hill's key near-term activities and milestones, see "*Use of Proceeds*".

**Figure A – Bunker Hill Planned Development Timeline**




## CONSOLIDATED CAPITALIZATION

Since September 30, 2022, the date of the Interim Financial Statements, there have been no material changes in the Company's consolidated capitalization other than as outlined in the below table and under the heading "*Prior Sales*" in this Prospectus. The following represents the Company's share capital both before and after the issuance of the Offered Shares under the Offering. The following table should be read in conjunction with the note below the table, the Annual Report on Form 10-K, the Annual Financial Statements, the Annual MD&A, the Interim Financial Statements and the Interim MD&A incorporated by reference in this Prospectus:

| Security | Amount Authorized | Outstanding as at September 30, 2022[1] | Outstanding on ●, 2022, after giving effect to the Minimum Offering | Outstanding on ●, 2022, after giving effect to the Maximum Offering |
|---|---|---|---|---|
| Common Shares | 1,500,000,000 | 219,649,187 | ● | ● |
| Broker Options[2] | N/A | 5,470,799 | ● | ● |

Notes:

(1) As at September 30, 2022, the Company had outstanding securities convertible to purchase Common Shares that could result in the issuance of up to an additional 275,643,775 Common Shares of the Company. See "*Prior Sales*".

(2) Eligible agents and finders acting in connection with certain financings were issued broker compensation options (the "**Broker Options**") as compensation for their services. The Broker Options were issued in August 2020, February 2021 and April 2022, have weighted average exercise prices of C$0.35, C$0.40, and C$0.30 respectively, and expire on August 31, 2023, February 16, 2024, and April 1, 2024 respectively. The Broker Options are exercisable into Offered Shares consisting of one Common Share and one Common Share purchase warrant.

## USE OF PROCEEDS

After payment of the estimated expenses of this Offering of approximately C$0.4 million, the estimated net proceeds from this Offering will be, assuming no exercise of the Over-Allotment Option and no sales to investors on the President's List or sales to Company Purchasers: approximately C$6.2 million in the case of the Minimum Offering (after deducting the Agents' Commission of approximately C$0.4 million) and approximately C$10.9 million in the case of the Maximum Offering (after deducting the Agents' Commission of approximately C$0.7 million).

Bunker Hill currently intends, subject to its sole discretion to change such allocation after the date of this Prospectus, to use the net proceeds as follows:

| Purpose | Approximate Use of Net Proceeds | |
|---|---|---|
| | Minimum Offering | Maximum Offering |
| Restart and development of Bunker Hill Mine – key milestones | C$3.8 million | C$5.8 million |
| Restart and development of Bunker Hill Mine – other | C$0.5 million | C$2.9 million |
| General corporate purposes | C$1.9 million | C$2.2 million |
| **Total** | **C$6.2 million[1]** | **C$10.9 million[2]** |

(1) Excluding the exercise of the Over-Allotment Option and assuming no sales to investors on the President's List or sales to Company Purchasers. If the Minimum Offering is completed and the Over-Allotment Option is exercised in full, after payment of the Agents' Commission of approximately C$0.5 million and estimated expenses of this Offering of approximately C$0.4 million, the estimated net proceeds from this Offering will be approximately C$7.1million.

(2) Excluding the exercise of the Over-Allotment Option and assuming no sales to investors on the President's List or sales to Company Purchasers. If the Maximum Offering is completed and the Over-Allotment Option is exercised in full, after payment of the Agents' Commission of approximately C$0.8 million and estimated expenses of this Offering of approximately C$0.4 million, the estimated net proceeds from this Offering will be approximately C$12.6 million

The Offering is being conducted on a commercially reasonable "best efforts" basis. The Offering will not be completed and subscription funds will not be advanced to the Company unless the Minimum Offering has been raised. See "*Cautionary Note Regarding Forward-Looking Information*."

### Business Objectives and Milestones

The Company believes that the net proceeds of the Offering will allow the Company to continue to progress with restart and development of the Bunker Hill Mine. Specifically, the business objectives that the Company wishes to accomplish using the net proceeds are: (i) completion of the ramp decline connecting the 5 and 6 levels of the mine; (ii) completion of demolition of the existing mill building; (iii) completion of plant engineering and civil works for installation of the process plant; and (iv) finalization of the purchase of the new ball mill, the key anticipated remaining component of the process plant required for the mine restart. For more information regarding the Company's business objectives and these milestones.

**Use of Proceeds if Minimum Offering Achieved**

If the Minimum Offering is achieved, the primary usage of the net proceeds of the Offering of approximately C$6.4 million will be for the completion of a number of key milestones for the restart and development of the Bunker Hill Mine. These milestones include: (i) completion of the ramp decline connecting the 5 and 6 levels of the mine; (ii) completion of demolition of the existing maintenance shop; (iii) completion of plant engineering and civil works for installation of the process plant; and (iv) finalization of the purchase of the new ball mill, the key anticipated remaining component of the process plant required for the mine restart.

The ongoing ramp decline encompasses approximately 1,800 feet of development work to connect transport infrastructure on the 5-Level with the existing spiral ramp for rubber-tired equipment on the 6-Level, which will provide access to deeper areas of the mine for future development and exploration activities. As of the date of this Prospectus, approximately 300 feet of development remains to be completed, including the establishment of a bespoke vent drift and placement of a primary mine fan to support the overarching ventilation plan. The advancement of this project to breakthrough to the 6-Level is a key milestone as it effectively unlocks access to mineralization for the initial years of the mine plan. Up to C$0.9 million of the net proceeds from the Offering will be used for the ramp decline, with up to C$0.4 million of the net proceeds from the Offering being used for post-breakthrough rehabilitation activities, including implementation of the longer-term mine ventilation plan in the pre-existing decline between the 6-Level and 8-Level.

The selected site for Bunker Hill's new process plant is currently occupied by a maintenance shop constructed in the first half of the twentieth century. The demolition of this historic infrastructure will encompass abatement, building removal and foundation extraction. These activities are expected to conclude by the end of 2022 and will represent a key milestone as they will ensure full operational readiness for advancing construction of the new process plant. Permits have been secured and the demolition contractor has mobilized to site, undergone site specific safety training, and begun work in earnest. The Company plans to use up to C$0.5 million of the net proceeds from the Offering for these demolition activities.

The completion of final detailed engineering related to the process plant, including that of crushing and conveying configurations and load out facilities, represents a key milestone and will allow for a smooth transition to construction and a prioritized effort on equipment rehabilitation. This work spans geotechnical studies, engineering design packages, and expenditures by the Company's procurement and construction management partner, Strike Group. The Company plans to use up to C$1.3 million of the net proceeds from the Offering on these activities.

As announced on September 20, 2022, the Company has secured a mill capable of increasing production throughput at the Bunker Hill Mine. The equipment secured includes a mill, motor and numerous spare parts, is being purchased from D'Angelo International LLC, and is intended to fulfill the 1,800 ton per day ("**tpd**") mine plan set out in the Technical Report. The Company is planning delivery of the mill in Q1 of 2023. A non-refundable down payment of US$0.1 million was paid in September 2022, with a further payment of US$0.1 million made in October 2022. The Company plans to use up to C$0.6 million of the net proceeds from the Offering to make the final payment of US$0.5 million in December 2022. The finalization of the purchase of the new ball mill represents a key milestone as it constitutes the last remaining major component of the process plant required for the mine restart.

Up to C$0.5 million of the net proceeds from the Offering will be used for other restart and development activities at the Bunker Hill Mine. Such activities include the procurement of long-lead time equipment and instrumentation, underground development activities, refurbishment of mill components acquired to date and other mine-site activities.

The remainder of the net proceeds from the Offering will be utilized for general corporate purposes.

**Use of Proceeds if Maximum Offering is Achieved**

If the Maximum Offering is achieved, the primary usage of the net proceeds of the Offering of approximately C$11.1 million will be for the completion of a number of key milestones for the restart and development of the Bunker Hill Mine. These milestones include: (i) completion of the ramp decline connecting the 5 and 6 levels of the mine; (ii) completion of demolition of the existing maintenance shop; (iii) completion of plant engineering and civil works for installation of the process plant; and (iv) finalization of the purchase of the new ball mill, the key anticipated remaining component of the process plant required for the mine restart.

The ongoing ramp decline encompasses approximately 1,800 feet of development work to connect transport infrastructure on the 5-Level with the existing spiral ramp for rubber-tired equipment on the 6-Level, which will provide access to deeper areas of the mine for future development and exploration activities. As of the date of this Prospectus, approximately 300 feet of development

remains to be completed, including the establishment of a bespoke vent drift and placement of a primary mine fan to support the overarching ventilation plan. The advancement of this project to breakthrough to the 6-Level is a key milestone as it effectively unlocks access to mineralization for the initial years of the mine plan. Up to C$0.9 million of the net proceeds from the Offering will be used for the ramp decline, with up to C$0.7 million of the net proceeds from the Offering being used for post-breakthrough rehabilitation activities, including implementation of the longer-term mine ventilation plan in the pre-existing decline between the 6-Level and 8-Level.

The selected site for Bunker Hill's new process plant is currently occupied by a maintenance shop constructed in the first half of the twentieth century. The demolition of this historic infrastructure will encompass abatement, building removal and foundation extraction. These activities are expected to conclude by the end of 2022 and will represent a key milestone as they will ensure full operational readiness for advancing construction of the new process plant. Permits have been secured and the demolition contractor has mobilized to site, undergone site specific safety training, and begun work in earnest. The Company plans to use up to C$0.5 million of the net proceeds from the Offering for these demolition activities, and up to C$1.8 million of the net proceeds from the Offering to advance subsequent process plant construction activities including civil works, foundation preparation and other surface works.

The completion of final detailed engineering related to the process plant, including that of crushing and conveying configurations and load out facilities, represents a key milestone and will allow for a smooth transition to construction and a prioritized effort on equipment rehabilitation. This work spans geotechnical studies, engineering design packages, and expenditures by the Company's procurement and construction management partner, Strike Group. The Company plans to use up to C$1.3 million of the net proceeds from the Offering on these activities.

As announced on September 20, 2022, the Company has secured a mill capable of increasing production throughput at the Bunker Hill Mine. The equipment secured includes a mill, motor and numerous spare parts, is being purchased from D'Angelo International LLC, and is intended to fulfill the 1,800 ton per day ("**tpd**") mine plan set out in the Technical Report. The Company is planning delivery of the mill in Q1 of 2023. A non-refundable down payment of US$0.1 million was paid in September 2022, with a further payment of US$0.1 million made in October 2022. The Company plans to use up to C$0.6 million of the net proceeds from the Offering to make the final payment of US$0.5 million in December 2022. The finalization of the purchase of the new ball mill represents a key milestone as it constitutes the last remaining major component of the process plant required for the mine restart.

Up to C$2.9 million of the net proceeds from the Offering will be used for other restart and development activities at the Bunker Hill Mine. Such activities include the procurement of long-lead time equipment and instrumentation, underground development activities, refurbishment of mill components acquired to date and other mine-site activities.

The remainder of the net proceeds from the Offering will be utilized for general corporate purposes.

**General**

The Company may require additional financing over and above the Offering in order to meet its longer-term business objectives and there can be no assurances that such financing sources will be available as and when needed. Historically, capital requirements have been primarily funded through the issuance of equity. Factors that could affect the availability of financing include the risks related to the ongoing operations of the Bunker Hill Mine, risks related to COVID-19, the state of international debt and equity markets, and investor perceptions and expectations of the zinc market. There can be no assurance that such financing will be available in the amount required at any time or for any period or, if available, that it can be obtained on terms satisfactory to the Company. Based on the amount of funding raised, the Company's plans for its use of proceeds may be postponed, or otherwise revised, as necessary. See "*Risk Factors*".

The Company is a development stage company and has incurred losses since its inception. The Company has incurred losses resulting in an accumulated deficit of US$59,626,902 as of September 30, 2022 and further losses are anticipated in the development of its business. The Company will be required to expend significant funds to determine whether proven and probable mineral reserves exist at its properties, to continue exploration and, if warranted, to develop its existing properties, and to identify and acquire additional properties to diversify its property portfolio. The Company's plans for the long-term return to and continuation as a going concern include financing its future operations through sales of its Common Shares and/or debt and the eventual profitable exploitation of the Bunker Hill Mine. In support of plans to rapidly restart the Bunker Hill Mine, the Company worked systematically through 2020 and 2021 to delineate mineral resources and conduct various technical studies. To continue executing this strategy will require securing additional financing. The Company may not be successful in obtaining the required financing or, if it can obtain such financing, such financing may not be on terms that are favorable to us. The future development

of the Company's business will require additional financing or refinancings. There are no assurances that such financing or refinancings will be available, or if available, available upon terms acceptable to the Company.

See "*Cautionary Note Regarding Forward-Looking Information*".

Although the Company intends to use the net proceeds from the Offering as set forth above, the actual allocation of the net proceeds may vary from those allocations set out above, depending on future developments in relation to the Bunker Hill Mine, or unforeseen events, including those listed under the "*Risk Factors*" section of this Prospectus and the Annual Report on Form 10-K. Readers are cautioned that, notwithstanding the Company's current intentions regarding the use of the net proceeds of the Offering, there may be circumstances where a reallocation of the net proceeds may be advisable for reasons that management believes, in its discretion, are in the Company's best interests. See "*Risk Factors*".

Until utilized, some or all of the net proceeds of the Offering may be held in cash balances in the Company's bank account or invested at the discretion of management short-term, high quality, interest bearing securities.

The Company has not had any significant revenue-generating operations in its history and therefore has had negative operating cash flow since inception. To the extent that the Company has negative operating cash flows in future periods, the Company may need to allocate a portion of its existing working capital to fund such negative cash flow. See "*Risk Factors*".

The Company's cash balance as at October 31, 2022 was approximately US$1.1 million. The Company has not compiled its working capital balance as at October 31, 2022, however management of the Company is not aware of any material changes from its working capital balance as of September 30, 2022.

As of September 30, 2022, the Company had a cash balance of approximately US$0.1 million and a positive working capital balance of approximately US$0.3 million. For a detailed breakdown of working capital balances by category, please refer to the financial statements in the quarterly report of the Company on Form 10-Q filed on SEDAR on November 4, 2022.

Significant additional capital will be required to fund the Company's business plan. The Company's planned development timeline (inclusive of activities mentioned above) includes the completion of detailed engineering, equipment procurement and rehabilitation, process plant site preparation, and process plant construction and commissioning. The Company's Technical Report includes an updated estimate of the capital expenditures and timing required to achieve these objectives. The Company expects that total project capital expenditures from September 2022 through December 2023 will be at least US$55 million, which corresponds to the initial capital expenditure estimate in the Technical Report. The Company intends to fund the majority of these capital expenditures from the advancement of the Stream Agreement from Sprott of up to US$37 million, together with any other financing required. The Company is seeking to secure the advance of the Stream Agreement from Sprott in early 2023. The advance of the Stream Agreement is at the discretion of Sprott. The Company will not be able to conduct these plans if it is not able to secure the advance of the Stream Agreement from Sprott by early 2023 or other forms of financing.

If the Stream Agreement is advanced, under the Royalty Convertible Debenture, the holder may elect to convert the US$8 million debt obligation to a gross revenue royalty on the Bunker Hill Mine. Any cash repayments under the Royalty Convertible Debenture would be funded from the proceeds of the Stream Agreement. The Company also has a promissory note outstanding, in the amount of US$1.5 million as of September 30, 2022, which the Company intends to repay from the proceeds of the Stream Agreement by March 31, 2023.

If the Stream Agreement is not advanced in early 2023, the Company intends to pursue alternative financing which could include equity, debt, royalty and/or stream financing. There can be no assurance that the Company will be able to secure the Stream Agreement or other such additional financing. Until such alternative financing could be secured, the Company would cease project activities after its significant milestones are achieved in the first quarter of 2023. The Company believes that the completion of its significant milestones would be conducive to securing additional financing.

The Company will be able to continue operations using its currently available resources and the proceeds of the Offering for approximately four months, and complete the milestones outlined in this Prospectus by March 31, 2023 which include: (i) completion of the ramp decline connecting the 5 and 6 levels of the mine; (ii) completion of demolition of the existing mill building; (iii) completion of plant engineering and civil works for installation of the process plant; and (iv) finalization of the purchase of the new ball mill, the key anticipated remaining component of the process plant required for mine restart.

## CERTAIN CANADIAN FEDERAL INCOME TAX CONSIDERATIONS

In the opinion of Blakes, counsel to the Company, and DLA Canada, counsel to the Agents, the following is, as of the date of this Prospectus, a summary of the principal Canadian federal income tax considerations under the Tax Act generally applicable to an investor who acquires an Offered Share pursuant to this Offering.

This summary applies only to a person who is a beneficial owner of Offered Shares acquired pursuant to this Offering, and who, for the purposes of the Tax Act, and at all relevant times, deals at arm's length with the Company and the Agents, is not affiliated with the Company and the Agents, and who acquires and holds the Offered Shares as capital property (a "**Holder**"). Generally, the Offered Shares will be considered to be capital property to a Holder thereof provided that the Holder does not acquire or hold the Offered Shares in the course of carrying on a business of trading or dealing in securities or as part of one or more transactions considered to be an adventure or concern in the nature of trade.

The Offered Shares are not "Canadian securities" for the purpose of the irrevocable election under subsection 39(4) of the Tax Act to treat all "Canadian securities," as defined in the Tax Act, owned by a Holder as capital property, and therefore such election will not apply to the Offered Shares. Holders who do not hold the Offered Shares as capital property should consult their own tax advisors regarding their particular circumstances.

This summary is not applicable to a Holder: (i) with respect to whom the Company is or will be a "foreign affiliate" within the meaning of the Tax Act, of such Holder or of another corporation resident in Canada that does not deal at arm's length with the Holder for purposes of the Tax Act; (ii) that is a "financial institution" for the purposes of the mark-to-market rules under the Tax Act, (iii) an interest in which is a "tax shelter" or a "tax shelter investment" as defined in the Tax Act, (iv) that is a "specified financial institution" as defined in the Tax Act, (v) who has made a "functional currency" reporting election under section 261 of the Tax Act to report the Holder's "Canadian tax results" (as these terms are defined in the Tax Act) in a currency other than the Canadian currency; (vi) that has entered or will enter into a "derivative forward agreement" or "synthetic disposition arrangement" (as those terms are defined in the Tax Act) with respect to the Offered Shares; or (vii) that is exempt from tax under the Tax Act. Additional considerations, not discussed herein, may be applicable to a Holder that is a corporation resident in Canada or a corporation that does not deal at arm's length, for purposes of the Tax Act, with a corporation resident in Canada, and is, or becomes as part of a transaction or event or series of transactions or events that includes the acquisition of the Offered Shares, controlled by a non-resident person, or group of non-resident persons not dealing with each other at arm's length, for purposes of the foreign affiliate dumping rules in section 212.3 of the Tax Act. Such Holders should consult their own tax advisors with respect to the income tax consequences of acquiring, holding and disposing of Offered Shares.

This summary is based on the assumption that the Company will not be a resident of Canada for purposes of the Tax Act.

This summary does not address the deductibility of interest by a Holder who has borrowed money or otherwise incurred debt in connection with the acquisition of the Offered Shares.

This summary is based on the facts set out in this prospectus, the current provisions of the Tax Act and counsel's understanding of the current administrative policies and assessing practices of the Canada Revenue Agency (the "**CRA**") published in writing by the CRA prior to the date hereof. This summary takes into account all specific proposals to amend the Tax Act that have been publicly announced by or on behalf of the Minister of Finance (Canada), prior to the date hereof, (the "**Proposed Amendments**") and assumes that such Proposed Amendments will be enacted in the form proposed, although no assurance can be given that the Proposed Amendments will be enacted in their current form or at all. Except for the Proposed Amendments, this summary does not take into account or anticipate any other changes in law or any changes in the CRA's administrative policies and assessing practices, whether by judicial, governmental or legislative action or decision, nor does it take into account other federal or any provincial, territorial or foreign tax legislation or considerations, which may differ materially from the Canadian federal income tax considerations described herein. The provisions of provincial income tax legislation vary from province to province in Canada and in some cases differ from the Tax Act.

**This summary is of a general nature only and is not intended to be, nor should it be construed to be, legal or tax advice to any particular Holder, and no representations with respect to the income tax considerations applicable to any particular Holder are made. This summary is not exhaustive of all Canadian federal income tax considerations. The relevant tax considerations applicable to the acquiring, holding and disposing of Offered Shares may vary according to the status of the purchaser, the jurisdiction in which the purchaser resides or carries on business and the purchaser's own particular circumstances. Accordingly, purchasers are urged to consult their own tax advisors about the specific tax consequences to them of acquiring, holding and disposing of Offered Shares.**

**Currency Conversion**

For purposes of the Tax Act, all amounts relating to the acquisition, holding or disposition of Offered Shares (including dividends, adjusted cost base and proceeds of disposition) must generally be expressed in Canadian dollars. Amounts denominated in any other currency must be converted into Canadian dollars generally based on the relevant exchange rate as determined in accordance with the Tax Act. The amount of dividends required to be included in the income of, and capital gains or capital losses realized by a Resident Holder (as defined below) may be affected by fluctuations in the Canadian/U.S. dollar exchange rate.

**Residents of Canada**

The following portion of this summary is generally applicable to a Holder who, for the purposes of the Tax Act and any applicable income tax treaty or convention, is resident or deemed to be resident in Canada at all relevant times (each, a "**Resident Holder**").

***Taxation of Dividends***

A Resident Holder will be required to include in computing such Resident Holder's income for a taxation year the amount of any dividends including amounts deducted for United States withholding tax, if any, received on the Offered Shares. Dividends received on the Offered Shares by a Resident Holder who is an individual will not be subject to the gross-up and dividend tax credit rules in the Tax Act normally applicable to taxable dividends received from "taxable Canadian corporations" as defined in the Tax Act. A Resident Holder that is a corporation will be required to include dividends received on the Offered Shares in computing its income and will generally not be entitled to deduct the amount of such dividends in computing its taxable income.

Dividends received by a Resident Holder that is an individual or trust, other than certain specified trusts, may give rise to a liability for minimum tax under the Tax Act.

To the extent that United States withholding tax is payable by a Resident Holder in respect of any dividends received on the Offered Shares, the Resident Holder may be eligible for a foreign tax credit or deduction under the Tax Act to the extent and under the circumstances described in the Tax Act. Resident Holders should consult their own tax advisors regarding the availability of a foreign tax credit or deduction in their particular circumstances.

***Disposition of Offered Shares***

A disposition or deemed disposition of Offered Shares by a Resident Holder (including on a purchase of Offered Shares for cancellation by the Company) will generally result in a capital gain (or capital loss) to the extent that the proceeds of disposition, net of any reasonable costs of the disposition, exceed (or are less than) the adjusted cost base to the Resident Holder of such Offered Shares immediately before the disposition. The adjusted cost base to a Resident Holder of an Offered Share will be determined by averaging the cost of that Offered Share with the adjusted cost base (determined immediately before the acquisition of the Offered Share) of all other Offered Shares held as capital property at that time by the Resident Holder. The tax treatment of capital gains and capital losses is discussed in greater detail below under the subheading "Taxation of Capital Gains and Capital Losses".

***Taxation of Capital Gains and Capital Losses***

Generally, one-half of any capital gain (a "**taxable capital gain**") realized by a Resident Holder must be included in the Resident Holder's income for the taxation year in which the disposition occurs. Subject to and in accordance with the provisions of the Tax Act, one-half of any capital loss incurred by a Resident Holder (an "**allowable capital loss**") must generally be deducted from taxable capital gains realized by the Resident Holder in the taxation year in which the disposition occurs. Allowable capital losses in excess of taxable capital gains for the taxation year of disposition generally may be carried back and deducted in any of the three preceding taxation years or carried forward and deducted in any subsequent year against net taxable capital gains realized in such taxation years, in the circumstances and to the extent provided in the Tax Act.

Capital gains realized by a Resident Holder that is an individual or trust, other than certain specified trusts, may give rise to a liability for minimum tax under the Tax Act.

United States tax, if any, levied on any gain realized on a disposition of the Offered Shares may be eligible for a foreign tax credit under the Tax Act to the extent and under the circumstances described in the Tax Act. Resident Holders should consult their own tax advisors with respect to the availability of a foreign tax credit, having regard to their own particular circumstances.

***Offshore Investment Fund Property Rules***

The Tax Act contains provisions (the "**OIF Rules**") which, in certain circumstances, may require a Resident Holder to include an amount in income in each taxation year in respect of the acquisition and holding of the Offered Shares if (1) the value of such Offered Shares may reasonably be considered to be derived, directly or indirectly, primarily from portfolio investments in: (i) shares of the capital stock of one or more corporations, (ii) indebtedness or annuities, (iii) interests in one or more corporations, trusts, partnerships, organizations, funds or entities, (iv) commodities, (v) real estate, (vi) Canadian or foreign resource properties, (vii) currency of a country other than Canada, (viii) rights or options to acquire or dispose of any of the foregoing, or (ix) any combination of the foregoing (the "**Investment Assets**") and (2) it may reasonably be concluded that one of the main reasons for the Resident Holder acquiring, holding or having the Offered Shares was to derive a benefit from portfolio investments in Investment Assets in such a manner that the taxes, if any, on the income, profits and gains from the Investment Assets for any particular year are significantly less than the tax that would have been applicable under Part I of the Tax Act if the income, profits and gains had been earned directly by the Resident Holder.

In making this determination, the OIF Rules provide that regard must be had to all of the circumstances, including (i) the nature, organization and operation of any non-resident entity, including the Company, and the form of, and the terms and conditions governing, the Resident Holder's interest in, or connection with, any such non-resident entity, (ii) the extent to which any income, profit and gains that may reasonably be considered to be earned or accrued, whether directly or indirectly, for the benefit of any such non-resident entity, including the Company, are subject to an income or profits tax that is significantly less than the income tax that would be applicable to such income, profits and gains if they were earned directly by the Resident Holder, and (iii) the extent to which any income, profits and gains of any such non-resident entity, including the Company, for any fiscal period are distributed in that or the immediately following fiscal period.

If applicable, the OIF Rules can result in a Resident Holder being required to include in its income for each taxation year in which such Resident Holder owns Offered Shares the amount, if any, by which (i) the total of all amounts each of which is the product obtained when the Resident Holder's "designated cost" (as defined in the Tax Act) of the Offered Shares at the end of a month in the year is multiplied by $^1/_{12}$ of the aggregate of the prescribed rate of interest for the period including that month plus two percentage points exceeds (ii) the Resident Holder's income for the year (other than a capital gain) in respect of the Offered Shares determined without reference to the OIF Rules. Any amount required to be included in computing a Resident Holder's income under these provisions will be added to the adjusted cost base of the Offered Shares and the designated cost of the Offered Shares to the Resident Holder.

The CRA has taken the position that the term "portfolio investment" should be given a broad interpretation. If the term "portfolio investment" should be given a broad interpretation, and even if the value of the Offered Shares may reasonably be considered to be derived, directly or indirectly, primarily from portfolio investments in Investment Assets, the OIF Rules will apply only if it is reasonable to conclude that one of the main reasons for a Resident Holder acquiring, holding or having the Offered Shares was to derive, either directly or indirectly, a benefit from Investment Assets in such a manner that the taxes, if any, on the income, profits and gains from such Investment Assets for any particular year are significantly less than the tax that would have been applicable under Part I of the Tax Act if the income, profits and gains had been earned directly by the Resident Holder.

**The OIF Rules are complex and their application will potentially depend, in part, on the reasons for a Resident Holder acquiring, holding or having the Offered Shares. Resident Holders are urged to consult their own tax advisors regarding the application and consequences of the OIF Rules in their own particular circumstances.**

***Additional Refundable Tax***

A Resident Holder that is, throughout the relevant taxation year, a "Canadian-controlled private corporation" (as defined in the Tax Act) may be subject to pay a refundable tax on its "aggregate investment income" (as defined in the Tax Act), including taxable capital gains and certain dividends. Proposed Amendments released on August 9, 2022 are intended to extend this additional tax and refund mechanism in respect of "aggregate investment income" to "substantive CCPCs" as defined in such Proposed Amendments. Resident Holders are advised to consult their own tax advisors regarding the possible implications of these Proposed Amendments in their particular circumstances.

***Foreign Property Information Reporting***

In general, a Resident Holder that is a "specified Canadian entity" (as defined in the Tax Act) for a taxation year or a fiscal period and whose total "cost amount" of "specified foreign property" (each as defined in the Tax Act), including the Offered Shares, at any time in the year or fiscal period exceeds C$100,000 will be required to file an information return with the CRA for the

taxation year or fiscal period disclosing certain prescribed information in respect of such property. Subject to certain exceptions, a taxpayer resident in Canada, other than a corporation or trust exempt from tax under Part I of the Tax Act, will be a "specified Canadian entity," as will certain partnerships. Penalties may apply where a Resident Holder fails to file the required information return in respect of such Resident Holder's "specified foreign property" (as defined in the Tax Act) on a timely basis in accordance with the Tax Act. The reporting requirements with respect to "specified foreign property" were expanded so that more detailed information is required to be provided to the CRA.

The reporting rules in the Tax Act are complex and this summary does not purport to address all circumstances in which reporting may be required by a Resident Holder. Resident Holders should consult their own tax advisors regarding the reporting rules contained in the Tax Act.

**Non-Residents of Canada**

The following portion of this summary is applicable to a Holder who: (i) has not been, is not, and will not be resident or deemed to be resident in Canada for purposes of the Tax Act or any applicable income tax treaty or convention; and (ii) does not and will not use or hold, and is not and will not be deemed to use or hold, the Offered Shares in connection with, or in the course of, carrying on a business in Canada (each a "**Non-Resident Holder**"). Special rules, which are not discussed in this summary, may apply to a Non-Resident Holder that is an insurer carrying on business in Canada and elsewhere or that is an "authorized foreign bank" (as defined in the Tax Act). Such Non-Resident Holders should consult their own tax advisors.

***Taxation of Dividends***

Dividends paid in respect of the Offered Shares to a Non-Resident Holder will not be subject to Canadian withholding tax or other income tax under the Tax Act.

***Disposition of Shares***

A Non-Resident Holder who disposes or is deemed to dispose of Offered Shares will not be subject to Canadian income tax in respect of any capital gain realized on the disposition or deemed disposition unless such Offered Shares constitute "taxable Canadian property" of the Non-Resident Holder for the purposes of the Tax Act and no exemption is available under an applicable income tax treaty or convention between Canada and the jurisdiction in which the Non-Resident Holder is resident.

Provided the Offered Shares are listed on a "designated stock exchange", as defined in the Tax Act (which currently includes the CSE), at the time of disposition or deemed disposition, the Offered Shares generally will not constitute taxable Canadian property of a Non-Resident Holder at that time, unless at any time during the 60 month period immediately preceding the disposition or deemed disposition the following two conditions are met concurrently: (i) one or any combination of the Non-Resident Holder, persons with whom the Non-Resident Holder did not deal at arm's length or partnerships in which the Non-Resident Holder or such non-arm's length person holds a membership interest (either directly or indirectly through one or more partnerships), owned 25% or more of the issued shares of any class of shares of the Company; and (ii) more than 50% of the fair market value of the Offered Shares of the Company was derived directly or indirectly from one or any combination of real or immovable property situated in Canada, "Canadian resource properties" (as defined in the Tax Act), "timber resource properties" (as defined in the Tax Act) or an option, an interest or right in such property, whether or not such property exists. Notwithstanding the foregoing, an Offered Share may otherwise be deemed to be taxable Canadian property to a Non-Resident Holder for purposes of the Tax Act in certain circumstances. Non-Resident Holders whose Offered Shares are taxable Canadian property should consult their own tax advisors for advice having regard to their particular circumstances.

## DESCRIPTION OF SECURITIES BEING OFFERED

The Offering consists of Common Shares. The authorized capital of Bunker Hill is 1,500,000,000 Common Shares. As at November 18, 2022, the last trading day prior to filing this Prospectus, Bunker Hill had 229,501,661 Common Shares issued and outstanding. All of the authorized Common Shares are of the same class and, once issued, rank equally as to voting rights, participation in a distribution of the assets of the Company on a liquidation, dissolution or winding-up of the Company and entitlement to any dividends declared by the Company. Each Common Share carries the right to one vote. In the event of the liquidation, dissolution or winding-up of the Company, or any other distribution of the assets of the Company among its shareholders for the purpose of winding-up its affairs, the holders of the Common Shares are entitled to receive rateably in all of the assets which are legally available after the payment of all the Company's debts and other liabilities. The holders of Common Shares are entitled to receive dividends as and when declared by the Board in respect of the Common Shares on a pro rata basis. The Common Shares do not have pre-emptive rights, subscription, redemption or conversion rights.

**Concurrently with the filing of this Prospectus with the securities commissions or similar authorities in Canada, the Company has filed a registration statement on Form S-1 with the SEC with respect to the distribution of the Offered Shares in the United States which has not yet been declared effective by the SEC. The Offered Shares may not be sold, nor may offers to buy be accepted, in the United States prior to the time the Offered Shares are registered in the United States.**

## PRIOR SALES

The following table summarizes the issuances by Bunker Hill of Common Shares within the 12 months prior to the date of this Prospectus.

| Date | Type of Security | Price per Security | Number of Securities |
|---|---|---|---|
| April 1, 2022 | Common Shares | C$0.30 | 1,471,664 |
| April 5, 2022[(1)] | Common Shares | C$0.256 | 1,315,856 |
| April 29, 2022[(2)] | Common Shares | C$0.311 | 768,750 |
| May 19, 2022 | Common Shares | C$0.30 | 10,416,667 |
| May 31, 2022[(3)] | Common Shares | C$0.30 | 37,849,325 |
| June 30, 2022 | Common Shares | C$0.30 | 1,218,000 |
| June 30, 2022[(2)] | Common Shares | C$0.215 | 165,000 |
| July 7, 2022[(1)] | Common Shares | C$0.25 | 1,975,482 |
| September 29, 2022[(2)] | Common Shares | C$0.12 | 33,000 |
| October 5, 2022[(1)] | Common Shares | C$0.129 | 8,252,940 |
| November 3, 2022[(2)] | Common Shares | C$0.09 | 1,599,150 |

Notes:
(1) Issued to holders of the Convertible Debentures and the holder of the Royalty Convertible Debenture pursuant to the Company exercising its option under the Convertible Debentures and Royalty Convertible Debenture to pay accrued and unpaid interest through the issuance of Common Shares.
(2) Issued pursuant to the exercise of RSUs.
(3) Issued pursuant to the exercise of Special Warrants.

The following table summarizes the share options ("**Share Options**"), restricted stock Offered Shares ("**RSUs**"), deferred stock Offered Shares (**"DSUs**"), common stock purchase warrants ("**Warrants**"), broker compensation warrants ("**Broker Compensation Warrants**"), Royalty Convertible Debenture, and Convertible Debentures granted by Bunker Hill within the 12 months prior to the date of this Prospectus.

| Date | Security | Issue/Exercise Price | Number of Securities |
|---|---|---|---|
| January 7, 2022 | Royalty Convertible Debenture | $8,000,000 | 1[(2)] |
| January 12, 2022 | RSUs[(1)] | C$0.31 | 500,000 |
| January 31, 2022 | Series 1 Convertible Debentures | $6,000,000 | 6[(3)] |
| April 1, 2022 | Special Warrants | C$0.30 | 37,849,325 |
| April 1, 2022 | Warrants | C$0.37 | 1,471,644 |
| April 1, 2022 | Broker Compensation Warrants | C$0.37 | 1,879,892 |
| April 29, 2022 | RSUs[(1)] | C$0.286 | 76,750 |
| May 19, 2022 | Warrants | C$0.37 | 10,416,667 |
| May 31, 2022 | Warrants | C$0.37 | 37,849,325 |
| June 17, 2022 | Series 2 Convertible Debentures | $15,000,000 | 1[(4)] |
| June 30, 2022 | Warrants | C$0.37 | 1,218,000 |
| August 24, 2022 | Share Options | C$0.15 | 300,000 |

| Date | Security | Issue/Exercise Price | Number of Securities |
|---|---|---|---|
| September 29, 2022 | RSUs(1) | C$0.12 | 33,000 |
| October 31, 2022 | RSUs(1) | C$0.09 | 1,599,150 |
| November 17, 2022 | RSUs(1) | C$0.185 | 4,396,741 |

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Notes:

(1) RSUs granted under the Company's RSU Plan and outstanding as at the date of this Prospectus are 4,822,741.

(2) Pursuant to the terms of the Royalty Convertible Debentures, the Company has an option to pay accrued and unpaid interest through the issuance of Common Shares. The Royalty Convertible Debenture bears interest at an annual rate of 9.0% payable in cash or Common Shares until such time that the Royalty Convertible Debenture holder elects to convert it into a royalty, with such conversion option expiring at the earlier of advancement of a multi-metals stream by the Royalty Convertible Debenture holder or 18 months from issuance.

(3) Pursuant to the terms of the Series 1 Convertible Debentures, the Company has an option to pay accrued and unpaid interest through the issuance of Common Shares. The Series 1 Convertible Debentures bear interest at an annual rate of 7.5% payable in cash or Common Shares, and a maturity date of March 31, 2025.

(4) Pursuant to the terms of the Series 2 Convertible Debentures, the Company has an option to pay accrued and unpaid interest through the issuance of Common Shares. The Series 2 Convertible Debentures bear interest at an annual rate of 10.5% payable in cash or Common Shares, and a maturity date of March 31, 2025.

## TRADING PRICE AND VOLUME

Bunker Hill's outstanding Common Shares are listed for trading on the CSE under the symbol "BNKR". The following table sets forth the high and low trading price and trading volumes of the Common Shares as reported by the CSE for the periods indicated:

| Month | High (C$) | Low (C$) | Volume |
|---|---|---|---|
| November 2021 | 0.275 | 0.19 | 3,065,689 |
| December 2021 | 0.42 | 0.21 | 4,513,490 |
| January 2022 | 0.37 | 0.28 | 1,786,218 |
| February 2022 | 0.34 | 0.27 | 605,159 |
| March 2022 | 0.375 | 0.255 | 3,413,600 |
| April 2022 | 0.30 | 0.27 | 1,913,570 |
| May 2022 | 0.28 | 0.225 | 1,125,771 |
| June 2022 | 0.30 | 0.20 | 1,501,387 |
| July 2022 | 0.225 | 0.135 | 2,089,728 |
| August 2022 | 0.16 | 0.12 | 2,785,158 |
| September 2022 | 0.13 | 0.115 | 2,446,011 |
| October 2022 | 0.13 | 0.09 | 2,599,221 |
| November 1, 2022 to November 18, 2022 | 0.20 | 0.085 | 1,926,888 |

Source: Bloomberg

## BUNKER HILL MINE

*The following is a summary of the Technical Report dated August 29, 2022. This summary does not purport to be complete and is subject to, and qualified in its entirety by reference to, the full text of the Technical Report which has been filed with the applicable Canadian securities regulatory authorities and is available on the Company's SEDAR profile at www.sedar.com.*

### Project Description, Location and Access

The Bunker Hill Mine is located in Shoshone County, Idaho with portions of the mine located within the cities of Kellogg and Wardner, Idaho in northwestern USA. The Kellogg Tunnel, which is the main access to the mine, is located at 47.53611°N latitude, 116.1381W longitude. The approximate elevation for the above cited coordinates is 2366 ft. The patented mining claims cover an area of 5,802 acres.

The area is accessed from Spokane, Washington via Interstate 90 east, to the mile 50 exit. Access to the Kellogg Tunnel is via McKinley Avenue, a public road, then using the Bunker Mine Road to the Kellogg tunnel entrance. The elevation of the mine is approximately 2,300 feet above sea level. The climate is favorable for year-round mining operations.

The closest major airports to the Bunker Hill Mine Project are in Spokane, Washington, 32 miles (51.5 km) west of Coeur d'Alene on I-90 and Missoula, Montana, 108 miles (174 km) east of Lookout Pass on I-90. Necessary supplies, equipment, and services to carry out exploration and mine development projects are available in Kellogg, Wallace, Mullan, Coeur d'Alene, and Wardner, Idaho, as well as Spokane, Washington. A trained mining workforce is available in the above-mentioned communities.

On December 15, 2021, Bunker Hill signed a Purchase and Sale Agreement (the "**PSA**") with Placer Mining Corporation ("**Placer Mining**") and both William and Shirley Pangburn to acquire full ownership of the subsequently listed mineral titles in addition to other surface rights and real property associated with the land and structures of the Bunker Hill Mine. On January 7, 2022, Bunker Hill, through its wholly owned subsidiary, Silver Valley, purchased the Bunker Hill Mine from Placer Mining and other private landowners. The property consists of a combination of patented mining claims with surface rights and mineral rights ("**Surface Parcels**"), patented mining claims without surface ownership rights ("**Mineral Parcels**" as more particularly described below), and additional land not patented as mining claims under the General Mining Act of 1872 ("**Platted Parcels**"). The Platted Parcels and Surface Parcels are more particularly described below.

Bunker Hill's land package purchased from Placer Mining, includes a mix of patented mining claims and ownership of surface parcels. The transaction also included certain parcels of fee property which include mineral and surface rights that are not patented mining claims. Mining claims and fee properties are located in Townships 47, 48 North, Range 2 East, Townships 47, 48 North, Range 3 East, Boise Meridian, Shoshone County, Idaho. The patented mining claims cover an area of 5,802.132 acres. Bunker Hill now owns all claims that lie within the tax parcels and fee parcels.

At the time of Silver Valley's purchase of the Bunker Hill Mine, Silver Valley obtained an Owner's Policy of Title Insurance ("**Owner's Policy**") and a Mineral Guarantee ("**Mineral Guarantee**") from First American Title Company in Kellogg, Idaho (the "**Title Company**") through Old Republic National Title Insurance Company.

The Owner's Policy insures title to the Surface Parcels and Platted Parcels is vested with Silver Valley, subject to the exclusions, exceptions, and conditions to coverage listed therein, with an amount of insurance of up to $7,700,000. Subject to these limitations, the Owner's Policy insures against loss or damage sustained by Silver Valley by reason of "Covered Risks", which include (among other things) any defect in, lien or encumbrance on the title to the Surface Parcels or Platted Parcels which is disclosed in a Public Record (as defined therein) as of the date of the policy and not otherwise excluded/excepted from coverage.

The Mineral Guarantee insures title to the surface of the Mineral Parcels, which is vested in owners other than Silver Valley, subject to the exceptions to coverage listed therein, in an amount of up to $4,000. The Mineral Guarantee provides information on the severance of the mineral estate from the surface rights and insures, subject to the liability exclusions, limitations, conditions, and stipulations set forth therein, against actual loss, not exceeding the liability amount, which Silver Valley shall sustain by reason of any incorrectness in the title to the surface of the Mineral Parcels. Research and records obtained through the Mineral Guarantee were used to determine the title owner of the Mineral Parcels.

Silver Valley obtained a title opinion from the law firm of Lyons O'Dowd, PLLC ("**Lyons**"). Lyons reviewed and relied upon the commitment for title insurance (the "**Title Commitment**") provided by the Title Company pertaining to the Surface Parcels and Platted Parcels and concluded that, as of the date of the opinion, Placer Mining and the other private sellers had good and merchantable title to the Surface Parcels and Platted Parcels, subject to the qualifications, exceptions, reservations, assumptions, limitations and disclaimers identified in Lyons's opinion, the Title Commitment, and the Mineral Guarantee.

With respect to the Mineral Parcels, Lyons reviewed and relied upon the information included in the Mineral Guarantee and, as of the date of the opinion, provided a limited opinion that Placer Mining had good and merchantable title to the Mineral Parcels, subject to the qualifications, exceptions, reservations, assumptions, limitations and disclaimers contained in Lyons's opinion, the Title Commitment, and the Mineral Guarantee.

Patented mining claims in the USA are described with respect to the Section, Township, and Range system employed throughout the country. The Surface Parcels, Mineral Parcels and Platted Parcels that comprise the Bunker Hill Mine land position are located in Townships 47, 48 North, Range 2 East, Townships 47, 48 North, Range 3 East, Boise Meridian, Shoshone County, Idaho. All the Surface Parcels, Mineral Parcels and Platted Parcels are patented (either through the General Mining Act or another fee-based patent act) and owned by Silver Valley as outlined herein; therefore, other than annual property taxes assessed by Shoshone County, there are no ongoing maintenance fees that would be paid for maintenance of unpatented mining claims through the (United States) Bureau of Land Management.

Patented mining claims in the State of Idaho do not require permits for underground mining activities to commence on private lands. Other permits associated with underground mining may be required, such as water discharge and site disturbance

permits. Water discharged from Bunker Hill Mine is being treated at the Central Treatment Plant (the "**Treatment Plant**"), which is located across the street from Bunker Hill Mine. The facility is owned by the EPA. Water discharged from the Treatment Plant meets the requirements of an existing National Pollutant Discharge Elimination System ("**NPDES**") permit for discharge into the South Fork of the Coeur d'Alene River. The company is required to obtain its own NPDES water discharge permit by May 14, 2023. Engineering work will be completed in 2022 for a water treatment system at Bunker Hill Mine to meet NPDES discharge limits (now Idaho Pollutant Discharge Elimination System, or "**IPDES**").

The land package included purchase of Bunker Hill Mine by Bunker Hill includes approximately the same land and mine infrastructure that was transferred to Placer Mining in 1992. Over 90% of surface ownership of the patented mining claims not owned by Placer Mining are owned by different landowners. These include: Stimpson Lumber Co.; Riley Creek Lumber Co.; Powder LLC.; Golf LLC.; C & E Tree Farms; and Northern Lands LLC.

On May 14, 2018, Bunker Hill Mining Corp., the EPA and the (United States) Department of Justice ("**DOJ**") entered into an administrative settlement agreement and order on consent. Concurrent with this administrative settlement agreement, on March 12, 2018, EPA and DOJ lodged a consent decree with the owner of the mine at the time, Placer Mining. The settlement package was essential for the redevelopment of Bunker Hill Mine because it established specific limitations on liability for past environmental damage related to the Comprehensive Environmental Response, Compensation, and Liability Act ("**CERCLA**"), also known as the United States Superfund, for the Bunker Hill Mine.

The Settlement Agreement and Order on Consent (the "**Settlement**") specifically limits Bunker Hill's liability for past environmental damage in exchange for performance of obligations that are described later in the agreement. The "Settlement" can be found and read in its entirety on the EPA's website under CERCLA Docket No. 10-2017-0123. These obligations include $20 million in recovery of past EPA response costs for the mine's water treatment through a schedule of payments that were to occur over a 7-year period starting in 2018. Bunker Hill also became liable for ongoing water treatment costs incurred by the EPA at the Treatment Plant. The agreement also specified a range of care and maintenance activities within the mine that would be required jointly with Placer Mining.

On December 18, 2021 Bunker Hill signed an amendment to the Settlement Agreement along with the EPA, DOJ and IDEQ. Material changes to the Settlement Agreement included a rescheduling of the payments so that $17 million of the historical cost recovery payments Bunker Hill anticipates making from projected future cash flow from sales of concentrate produced by the mine.

Other changes included a modification of payment for current ongoing water treatment services provided to the mine by EPA and IDEQ. Rather than two semi-annual payments of $480,000, Bunker Hill will make a monthly payment of $140,000 for the first 12 months after execution of the amendment. From months 13 onward, the monthly payment will increase to $200,000. The increase in annualized costs of water treatment is the result of recently completed upgrades of the water treatment system at the Treatment Plant that allow it meet more stringent discharge standards. If and when Bunker Hill develops its own water treatment system that is capable of meeting water discharge standards, these payments will cease.

No additional environmental liabilities are anticipated as a result of the activities planned by Bunker Hill. The company will initiate a voluntary Environmental Social and Health Impact Assessment that conforms to International Organization for Standardization ("**ISO**") standards and Industry Foundation Classes ("**IFC**") standards. The study will commence in Q4 of 2022 and is expected to conclude in Q1 of 2024. The study contains 13 component studies that will measure a broad range of impacts. The study will be used to development plans and activities that maximize positive impacts of the mine's production and mitigate any negative impacts.

No permits are required for the initiation of mining activities on the Property. Permits will be required for air emissions associated with certain milling and processing activities. Mine water discharge will be processed at the Treatment Plant.

On December 20, 2021, the Company executed a non-binding term sheet outlining a $50,000,000 project finance package with Sprott. The non-binding term sheet with Sprott outlined a project financing package that the Company expects to fulfill the majority of its funding requirements to restart the Bunker Hill Mine. The term sheet consisted of an $8,000,000 royalty convertible debenture (the "**RCD**"), a $5,000,000 convertible debenture (the "**CD1**"), and a multi-metals stream of up to $37,000,000 (the "**Stream**"). The CD1 was subsequently increased to $6,000,000, increasing the project financing package to $51,000,000.

On June 17, 2022, the Company consummated a new $15,000,000 convertible debenture (the "**CD2**"). As a result, total potential funding from Sprott was further increased to $66,000,000 including the RCD, CD1, CD2 and the Stream (together, the "**Project Financing Package**").

The Company closed the $8,000,000 RCD on January 7, 2022. The RCD bears interest at an annual rate of 9.0%, payable in cash or Common Shares at the Company's option, until such time that Sprott elects to convert a royalty, with such conversion option expiring at the earlier of advancement of the Stream or July 7, 2023 (subsequently amended as described below). In the event of

conversion, the RCD will cease to exist and the Company will grant a royalty for 1.85% of life-of-mine gross revenue from mining claims considered to be historically worked, contiguous to current accessible underground development, and covered by the Company's 2021 ground geophysical survey (the "**Sprott Royalty**"). A 1.35% rate will then apply to claims outside of these areas. The RCD was initially secured by a share pledge of the Company's operating subsidiary, Silver Valley, until a full security package was put in place concurrent with the consummation of the CD1. In the event of non-conversion, the principal of the RCD will be repayable in cash.

Concurrent with the funding of the CD2 in June 2022, the Company and Sprott agreed to a number of amendments to the terms of the RCD, including an amendment of the maturity date from July 7, 2023, to March 31, 2025. The parties also agreed to a Royalty Put Option such that in the event the RCD is converted into a royalty as described above, the holder of the royalty will be entitled to resell the royalty to the Company for $8,000,000 upon default under the CD1 or CD2 until such time that the CD1 and CD2 are paid in full.

The Company closed the $6,000,000 CD1 on January 28, 2022, which was increased from the previously announced $5,000,000. The CD1 bears interest at an annual rate of 7.5%, payable in cash or shares at the Company's option, and matures on July 7, 2023 (subsequently amended, as described below). The CD1 is secured by a pledge of the Company's properties and assets. Until the closing of the Stream, the CD1 was to be convertible into Common Shares at a price of C$0.30 per Common Share, subject to stock exchange approval (subsequently amended, as described below). Alternatively, Sprott may elect to retire the CD1 with the cash proceeds from the Stream. The Company may elect to repay the CD1 early; if Sprott elects not to exercise its conversion option at such time, a minimum of 12 months of interest would apply.

Concurrent with the funding of the CD2 in June 2022, the Company and Sprott agreed to a number of amendments to the terms of the CD1, including that the maturity date would be amended from July 7, 2023, to March 31, 2025, and that the CD1 would remain outstanding until the new maturity date regardless of whether the Stream is advanced, unless the Company elects to exercise its option of early repayment. The Company determined that amendments to the terms should not be treated as an extinguishment of CD1, but as a debt modification.

The Company closed the $15,000,000 CD2 on June 17, 2022. The CD2 bears interest at an annual rate of 10.5%, payable in cash or shares at the Company's option, and matures on March 31, 2025. The CD2 is secured by a pledge of the Company's properties and assets. The repayment terms include 3 quarterly payments of $2,000,000 each beginning June 30, 2024, and $9,000,000 on the maturity date.

In light of the Series 2 Convertible Debenture financing, the previously permitted additional senior secured indebtedness of up to $15 million for project finance has been removed.

A minimum of $27,000,000 and a maximum of $37,000,000 (the "**Stream Amount**") will be made available under the Stream, at the Company's option, once the conditions of availability of the Stream have been satisfied including confirmation of full project funding by an independent engineer appointed by Sprott. If the Company draws the maximum funding of $37,000,000, the Stream will apply to 10% of payable metals sold until a minimum quantity of metal is delivered consisting of, individually, 55 million pounds of zinc, 35 million pounds of lead, and 1 million ounces of silver (subsequently amended, as described below). Thereafter, the Stream would apply to 2% of payable metals sold. If the Company elects to draw less than $37,000,000 under the Stream, the percentage and quantities of payable metals streamed will adjust pro-rata. The delivery price of streamed metals will be 20% of the applicable spot price. The Company may buy back 50% of the Stream Amount at a 1.40x multiple of the Stream Amount between the second and third anniversary of the date of funding, and at a 1.65x multiple of the Stream Amount between the third and fourth anniversary of the date of funding. As of November 21, 2022, the Stream has not been advanced.

Concurrent with the funding of the CD2 in June 2022, the Company and Sprott agreed that the minimum quantity of metal delivered under the Stream, if advanced, will increase by 10% relative to the amounts noted above.

**History**

Initial discovery and development of the Bunker Hill Mine began in 1885, and from that time until the mine closed for the final time in 1991 total production from the mine totaled 42.77 million tons at an average grade of 8.43% Pb, 3.52 oz Ag/ton and 4.52% Zn. Through its history the area encompassing the Bunker Hill mine accounts for nearly 42% of the total lead, 41% of the zinc and 15% of the silver production in the Coeur d'Alene Mining District. Only the Sunshine and Galena mines have produced more silver. Over this long history, over 40 separate mineralized zones were exploited at the Bunker Hill mining complex.

The Bunker Hill lode, in Milo Gulch, was discovered by prospector Noah S. Kellogg on September 9, 1885. Legend has it that Kellogg's wandering burro found the mineralized outcrop. Grubstaking a prospector was common in the early days of the Coeur d'Alene Mining District and it was under these arrangements that local Murray merchants John T. Cooper and Origin O. Peck outfitted Noah Kellogg when he set out to look for gold up the South Fork of the Coeur d'Alene River in August of 1885.

Soon after the discovery, the partners entered into an agreement with Jim Wardner whereby he secured capital for development of the mine and construction of a mill. After negotiating a contract with Selby Smelting Company to treat the process plant product, Wardner was able to interest a syndicate who organized the Helena Concentrating Co. This company built the first process plant on the Sullivan side of the gulch in July of 1886.

In 1887 Simeon Gannet Reed purchased the claims and process plant for a total of $750,000 and, in partnership with Martin Winch and Noah Kellogg, incorporated the Bunker Hill and Sullivan Mining and Concentrating Company. The financial headquarters of the company was transferred to San Francisco in September 1891. The Oregon corporation was dissolved on March 24, 1924, and the company was reincorporated in Delaware. In 1956 that the name was shortened to The Bunker Hill Company.

As the mine production increased, a process plant of larger capacity was needed, and in 1891 a 400 ton (363 tonne) per day process plant was built in the main valley below the confluence of Milo Creek with the South Fork of the Coeur d'Alene River. To transport mineralization to the process plant, an aerial tramway, with a horizontal length of 10,000 ft (3,048 m), was constructed from Wardner. This tramway served to transport all mine mineralization until the two-mile (3.2 km) Kellogg Tunnel was completed in 1902. In 1898 the Bunker Hill and Sullivan Mining and Concentrating Co. and the Alaska Treadwell Company each purchased 31.34 percent of the stock of the Tacoma Smelter on Puget Sound, rehabilitated the plant, and thereby provided a facility for smelting. When the smelter closed its lead plant in 1912, lead from the Bunker Hill Mine was shipped to Selby, California, and East Helena, Montana for processing. In 1916 the company began the construction of a lead smelter at Kellogg which went into operation in July 1917.

The Kellogg Tunnel, started in 1893 and completed in 1902, permitted exploration work to take place on the tunnel level and the intervening ground between the tunnel and the surface. This resulted in the opening up of the Carey and July stopes on the 7th and 8th levels and the March stope on the tunnel or No. 9 level. These were three of the highest grade and most productive stopes in the history of the mine.

At Kellogg, the company operated the Bunker Hill lead-zinc-silver Mine and the Crescent Silver-Copper Mine, a lead smelter and refinery, electrolytic zinc reduction plant, cadmium plant, zinc fuming plant, sulfuric acid plant and a phosphoric acid plant. Historically, the Bunker Hill Mining Company accurately recorded the production grades from individual mining areas. In the early mine life, a portion of the mining was carried out by contractors or "leasers" who were paid for the mineral content of the mineralization shipped to the process plant by sampling each carload of mineralization shipped. Accurate records of their production are documented and represent the grade of mineralization shipped for processing.

Pre-development exploration drilling and assaying was limited the early years of production and accelerated later in the mine's life with a total sum of over 3500 drill holes representing over 200,000 feet of drilling. Early exploration was primarily done by exploratory drifting and cross-cutting. Over the course of several years in the late 1970s, a dedicated team of geologists conducted ground-breaking research on the mineralized controls of the veins. The research for the first time defined distinct stratigraphic horizons in the upper Revett formation that could be correlated and mapped over distances of thousands of feet. The 1970s research ended shortly before the mine closed, and the new concepts were never fully applied to exploration.

Total production from the past-producing Bunker Hill Mine from 1885 through 1981 is 35,779,448 tons (32,458,578.5 t) grading 8.76% lead, 3.67% zinc and 4.52 oz/ton (155 g/t) silver (Meyer and Springer 1985, Bingham 1985).

The largest individual zones include the March with 4,735,795 tons (4,296,242 tonnes) grading 12.03% lead, 2.25% zinc and 5.22 oz/ton (179 g/t) silver, and the Emery with 3,744,798 tons (3,397,224.5 tonnes) grading 10.31% lead, 3.86% zinc and 6.17 oz/ton (211.5 g/t) silver (Meyer and Springer 1985).

The highest-grade silver zones include the Caledonia mine with 263,182 tons grading 12.6% lead and 30.75 oz/ton silver, the Senator Stewart mine with 1,014,814 tons grading 7.9% lead and 6.34 oz/ton silver, the J-Vein with 1,130,414 tons grading 9.8% lead and 7.59 oz/ton silver, and the Truman-Ike vein with 1,861,295 tons grading 10.31% lead and 7.47 oz/ ton silver.

These historical production figures do not include production from the 18-month period when the mine was re-opened between 1989 and 1991.

Following its discovery in 1885, the Bunker Hill Mine operated continuously until 1981, except in times of labor stoppages. The mine was also operated from 1989 until January 1991 by the Bunker Limited Partnership.

During the mine operations, production came from 15 or more separate deposits mined over a vertical range of 4,800 ft (1,463 m) from 3,200 ft (975 m) above sea level to 1,600 ft (488 m) below sea level. The main entry was through the Kellogg Tunnel at 2,400 ft (732 m) elevation, (on nine level) and access to deposits below that level was by means of three major inclined shafts and other auxiliary inclines. In total, well over 100 miles (161 km) of major horizontal openings were maintained, as well as six miles (9.7 km) of shafts and raises.

The primary access to the Bunker Hill Mine is the 10,000-foot (3,048 m) Kellogg Tunnel at the 9 Level elevation. A shaft extends down to the 31 level with the 29 level being the deepest developed level. The 29 level is 4,000 ft (1,220 m) below the Kellogg Tunnel. Over the 100 years of production, various mining methods have been used at the past producing Bunker Hill Mine. These include:

- Square set cut and fill;
- Captive cut and fill with classified mine tailings as backfill (below 8 Level only);
- Shrinkage mining without backfill (above 8 Level);
- Sub-level blast hole (Long hole) mining; and
- Sub-level caving (Guy Cave).

Square-set cut and fill was likely the original mining method from the 1880s. The veins were mined with sets of timbers used as ground support which were then buried by sand fill pumped down from the surface. After backfilling, the next level above the sand was mined. The broken material was slushed to chutes where it dropped into passes to the level below. In other areas, a pillar mining method was used. Instead of timber as support, rib pillars were established. Sand fill was pumped in to provide the floor for the next cut. As the material was blasted, compressed air operated mucking machines transported it to a chute in the stope where it dropped into a pass to the lower level.

In the upper areas of the mine, sub-level blasthole stoping was used. Trackless equipment was used to cut levels at 40 foot (12.2 m) spacing. Long holes were drilled in the pillars between levels. The holes were blasted, allowing the material to fall to the bottom of the stope, where it was scooped by LHDs, which, depending on the area of the mine, either transported it to passes connected to the mine rail haulage system or place it on trucks for transport directly to the surface.

For mining areas above the Kellogg Tunnel, broken material was hauled by trackless equipment to one of two central passes which stored the material until it could be chute loaded into the main track haulage system operating in the Kellogg Tunnel.

For mining areas below the Kellogg Tunnel, trains powered by battery locomotives transported the material to bins located at the inclined hoisting shaft. In the shaft, skips were loaded and hoisted to skip dumps located above the Kellogg Tunnel level where the material was dumped into two large concrete bins until it could be chute loaded into the main track haulage system operating in the Kellogg Tunnel. Drawn from these storage areas by gravity, the material was chute loaded into 22 car trains pulled by 15-ton diesel locomotive and trammed two miles (3.2 km) to the surface process plant bins. The material was then processed by the Bunker Hill process plant to produce concentrates.

After 1970, diesel-powered equipment was utilized in parts of the lower mine to improve productivity and access to selected areas. In 1972, major production was resumed using bulk mining methods in the upper mine (above 9 Level), the portion above the Kellogg Tunnel, which had not been worked since the 1930s. The upper mine was partially mechanized with diesel equipment. This area of the mine produced approximately 7,000 tons (6,350 tonnes) per week (45% of total mine production) through April 1977. The upper mine was then placed on a care and maintenance basis pending improvement in the zinc market. Some production was obtained from the upper mine in the period 1978 to 1981 by extracting previously broken mineralization.

Following a 1977 strike, the lower mine resumed operations at a production rate of approximately 9,000 tons (8,165 tonnes) per week. Through April 1977, the flotation process plant operated on a three-shift basis, seven days a week, at approximately its full capacity milling rate of 2,300 tons (2,087 tonnes) per day. The concentrates produced were transported to Bunker Hill Mining Company's lead smelter and zinc plant by railway.

The Mine and Smelter Complex were closed in 1981 as result of weak commodity prices, failure to renew labor contract, and increased environmental regulation. The Bunker Hill lead smelter, electrolytic zinc plant and historic milling facilities were demolished about 25 years ago, and the area became part of the "National Priority List" for cleanup under EPA regulations, thereby pausing development of the Bunker Hill Mine for over 30 years. All of the cleanup of the old smelter, zinc plant, and associated sites has now been completed.

The Bunker Hill Mine main level is the nine level and is connected to the surface by the Kellogg Tunnel. Three major inclined shafts with associated hoists and hoistrooms are located on the nine level. These are the No. 1 shaft, which was used for primary muck hoisting for all locations below the nine level; the No. 2 shaft, which was a primary shaft for men and materials in the main part of the mine; and the No. 3 Shaft, which was used for men and materials hoisting for development in the northwest part of the mine. The Company believes that all three shafts remain in a condition that they are repairable and can be bought back into good working order and is in the process of beginning the engineering work to evaluate the strategic optionality of this infrastructure.

The water level in the mine is held at approximately the 11 level of the mine, 400 ft (122 m) below the nine level. The mine was historically developed to the 29 level, although the 27 level was the last major level that underwent significant development and past mining.

Over the 100-year history of active operations at Bunker Hill over 3,500 drill holes were drilled, logged and assayed. The first drillhole was drilled on the 5 level in 1889. All drill hole information including assays, lithology, and structure was recorded in hand-written drill logs. Bunker Hill has painstakingly digitized the entire body of historic drill hole data and created a digital drill hole database. During the digitization process a collection of assay pulps was located and able to be associated with a subset of the historic drill holes. These pulps were re-assayed and compared to the historic assay data to verify the accuracy of the assay information.

Mining operations ceased in January 1991. The Property hosted historical estimates which were categorized using categories other than those set out in NI 43-101. Estimates were categorized as Proven Reserves, Probable Reserves, Possible Reserves and Drill-Indicated Reserves. The main difference between the Historical Estimate classifications and NI 43-101 classifications is that NI 43-101 reserves are based on the conversion of resources to reserves. Historically, US mining operations such as Bunker Hill were prohibited from disclosing resources.

Meyer (1990) included mineralized material in the historical estimates on the basis of a cut-off equivalent to the production cost of mining. This was established at $23.00 per ton for material mined below the nine level. For material mined above the nine level the production cost was set at $20.00 per ton. Metals prices used were $0.40 / lb. for lead, $5.00/oz for silver and $0.65/lb for zinc. Net smelter values were calculated for the three metals using the then current metallurgical recoveries and net smelter payable values. Meyer's (1990, 1991) historical estimates were calculated by the following method: Volumes (and subsequent tonnage) were calculated by vertical projection from level plans of mined out areas. Grades were calculated by averaging the grades on the stope assay map from which the projections were made. The Bunker Hill Mine was an active mine at the time of Meyer's estimations and the procedures used were consistent with mineralization estimates made in other similar operations.

Meyer (1990) has reported on the historical estimate for the Bunker Hill Mine as of July 1, 1990. Meyer's (1990) report estimated that proven and probable reserves totaled 8,266,430 tons (7,499,181 tonnes) grading 2.13% lead, 1.12 oz/ton (38.4 g/t) silver and 4.73% zinc. Possible reserves totaled 2,588,081 tons (2,347,868 tonnes) grading 2.55% lead, 1.39 oz/ton (47.7 g/t) silver and 4.48% zinc. The possible "reserves" included drill indicated material at the Quill and Guy Cave zones.

Meyer (1991) estimated the historical estimates for the Bunker Hill Mine as of January 1, 1991. Meyer's (1991) report estimated that historical proven and probable reserves totaled 5,421,387 tons (4,918,200 tonnes) grading 2.46% lead, 1.37 oz/ton (47.0 g/t) silver and 5.17% zinc. Possible reserves totaled 3,719,722 tons (3,374,475 tonnes) grading 2.20% lead, 1.17 oz/ton (40.1 g/t) silver and 4.94% zinc. The possible reserves included drill indicated material at the Quill and Guy Cave zones.

The historic estimate used categories other than those referenced in NI 43-101. There are no more recent mineral historic resource estimates available. Bunker Hill has not done sufficient work to classify the historical estimate as current mineral resources. The historic estimate is not being treated as the current mineral resource.

**Geological Setting, Mineralization and Deposit Types**

The Northern Idaho Panhandle Region in which the Bunker Hill Mine property is located is underlain by the Middle Proterozoic-aged Belt-Purcell Supergroup of fine-grained, dominantly siliciclastic sedimentary rocks which extends from western Montana (locally named the Belt Supergroup) to southern British Columbia (locally named the Purcell Supergroup) and is collectively over 23,000 feet in total stratigraphic thickness. The Belt-Purcell Supergroup comprises, from oldest to youngest:

- Black, pyritic argillites of the Pritchard formation, up to 13,100 ft thick.
- Quartzites, siltite, and argillites of the Ravalli Group, subdivided into the Burke, Revett and St. Regis formations, up to 8,200 ft total thickness. The Revett formation is the almost exclusive host unit to mineralization at Bunker Hill.
- Shallow-water dolomitic quartzites and arenaceous dolomites of the Middle Belt Carbonate Group, up to 6,560 ft thick.
- Interbedded quartzites and argillites of the Missoula Group, up to 1,640 ft thick.

The sediments of the Belt-Purcell rocks were deposited in an intra-cratonic basin associated with rifting in the interior of the Rodinia Supercontinent. As no known volcanism is associated with this rifting, it appears to be related to lithospheric tension and not the ascent of a magmatic plume in the crust shoving overlying sediments aside, making it a passive rather than an active rift system (Lyndon, 2007).

Contacts between rock units and progression between lithologies show a continuously aggrading sequence of deposition, largely from flooding in fluvial and tidal systems, with no erosional contacts or large-scale channel-scouring bedforms. This indicates deposition in a low-energy, shallow-water environment in a rapidly subsiding, sediment-starved basin with ample accommodation space for sediment inflow. Carbonate units in the Supergroup show periodic connections between the depositional basin and the open ocean allowed for shallow flooding of the entire basin by seawater, although lack of tidal and

wave scouring textures or transgressive-regressive depositional and erosional sequences indicate that the connection was never large enough for transmission of tidal or oceanic storm forces.

Individual sedimentary beds and units within the Belt-Purcell Supergroup do not display strong lateral continuity, reflecting active subsidence in the basin and varying sediment sources. Thickening of the stratigraphic units to the south suggests that the basin in which they were deposited was growing at depth and laterally with down-to-the-south normal fault movement of crustal blocks within the basin (White, 1977). Sources for sediments have been identified as coming from the south and southwest for the majority of the life of the Basin.

Burial of the Belt Basin under later sedimentary and igneous rock packages, all now eroded away, lithified and preserved the entire stratigraphic section. Deep burial resulted in low-grade metamorphism, fusing the grains of sandstone together into hard, competent quartzites, and altering clay-rich shales into argillites and siltites (Herendon, 1983). Age dates for deposition of the Belt rocks have been established at 1400-1470 million years ago from U-Pb age dating of detrital volcanic zircon grains (Hobbs, et al, 1965).

The rocks of the Belt Supergroup have been subjected to a complex series of deformational events over the 1.4 billion years since deposition, with the focal point of many of these forces roughly underlying the current Coeur D'Alene Mining District (the "**CDA Mining District**"). Regardless of which detailed geologic interpretation one chooses to define individual deposits, it is clear that the rocks have seen a complex structural history of folding, shearing and faulting that have given the entire district a deep-seated plumbing system for ascending, mineral-bearing hydrothermal fluids.

The first structural event to affect the Belt Rocks in the CDA Mining District ("**D1**") was compressive forces coming from the southwest and northeast which formed northwest oriented anticline and syncline pairs with a moderate plunge to the northwest, with local overturned folds and thrust faulting. Following the formation of the NW trending folds, crustal stresses changed from SW-NE compression to west-northwest and east-southeast ductile shearing ("**D2**"). This bent and rotated the limbs of the D1 folds, creating kink-folds along the axial planes.

Folding and rotation continued to intensify in a structural knot centered over the current CDA Mining District, with incipient strike-slip faulting beginning to accommodate stress within the plunging hinges and along the axial planes of the D2 folds and rotation centers. This was followed by emplacement of monzonite stocks in elongate bodies, roughly parallel to the rotated N-S fold axes, north of the ancestral Osburn Fault. These monzonite stocks have been dated at roughly 100 million years old by lead-alpha methods (Hobbs, et al, 1965), placing them in the same Cretaceous age range as the rocks of the Atlanta and Bitterroot lobes of the Idaho Batholith to the south. Much of the mineralization in the CDA Mining District was likely emplaced during this episode of maximum folding and stretching, along with the added heat source of the intrusions. Although there have been many theories regarding the timing, formation and source of mineralization in the CDA Mining District over the 140 years of mining and exploration, the culmination of fold intensity and intrusive emplacement agrees with most all further, more-detailed interpretations.

With continued crustal stresses, discontinuous fractures propagated through the stratigraphic section to become through-going structures. Ductile folding of the rock package ceased as strike-slip movement along these W-NW striking faults accommodated crustal stresses. This corridor corresponds with the Lewis and Clark Structural Zone, a long-lived, apparently basement-rooted, westerly trending structural zone cutting across northern Idaho and western Montana (White 2015). Further movement along these westerly faults coalesced into the Osburn Fault, the major structure throughout the Silver Valley and CDA Mining District, which at present position shows as much as 16 miles of right-lateral, strike-slip displacement.

Mineralization at the Bunker Hill Mine is hosted almost exclusively in the Upper Revett formation of the Ravalli Group, a part of the Belt Supergroup of Middle Proterozoic-aged, fine-grained sediments. As the Middle and Lower Units of the Revett formation and the stratigraphically overlying St. Regis formations do not host appreciable mineralization, mine geologists at Bunker Hill did not spend a great deal of time mapping or interpreting these units. As this is still the case as far as known mineralization or exploration targets, the local rock package is restricted to the Upper Revett formation sediments. One west-northwest striking mafic dike has been noted on mine maps in development drifts to the north of any known mineralization, but little is known of this feature and no mineralization or alteration is associated with it.

Given the ubiquitous fine-grained nature of Belt Group sediments in the CDA Mining District, putting together a proper stratigraphic section had always proved enigmatic to area geologists, with correlation between adjacent mines difficult due to discontinuity of units and differences in nomenclature. It was recognized that there are fairly abrupt lateral gradations of compositions and textures within the stratigraphic package, reflecting active subsidence of the Belt Basin and the changing influx of sediments. As has long been informally recognized by mine operators in the Bunker Hill Mine area, preferential host rocks for mineralization are the more competent quartzite units within the Upper Revett formation.

For much of the history of the Bunker Hill Mine, mining focused on mineralized zones and veins that outcropped on surface, and so little geologic knowledge was needed to find or follow these structures. By the mid 1970's, these large mineral bodies (such as the March) had been mined out, and the Company had to develop an exploration plan to locate additional resources.

Following extensive mapping, measured stratigraphic sections and comparison with drill core and mine level mapping during a research program in the 1970's, Brian White developed a detailed stratigraphic section for the Upper Revett formation in the immediate Bunker Hill Mine area that greatly simplified interpretations of structural offsets and eliminated needless ranges of description for rocks of the same lithologic facies.

White delineated the rocks in the Bunker Hill Mine area into three lithologic types:

(**Q**) Quartzite: fine-grained, clean and well sorted with a vitreous appearance on fractures, almost entirely quartz with minor feldspar, thick bedded to massive, local crossbedding. Quartz grains fully fused, continuous metal streak with nail scratcher, ideal host to mineralization. Generally white to light gray color.

(**SQ**) Sericitic Quartzite: dominantly fine-grained quartz sand protolith, feldspar and clay content altered and mobilized to interstitial sericite during burial metamorphism. Fairly competent, intermittent streak with metal scratcher, thick to thin bedded, decent to marginal host rock to mineralization. Light to dark gray in color, distinct light green-gray in weathered outcrop.

**(SA)** Siltite-Argillite: anything that is a dominantly mud, silt or clay protolith, representing a distinct lower-energy, deeper water depositional facies than the shallow-water to sub-aerial, relatively high-energy quartzite units. Thin, planar bedding with local ripple marks and sediment loading textures. Very poor host rock for mineralization unless cut obliquely by vein structures. Highly variable color, generally shades of green with occasional shades or red and purple.

A series of distinct sediment packages were identified in the Upper Revett formation across the mine workings. From bottom to top of the section, these are the:

Lower **L-0** though **L-6** quartzites

Middle **M-1** siltite-argillite, **M-2** quartzite and **M-3** siltite-argillite

Upper **U-1,2,3,4** and **5** quartzites and **U-6** siltite-argillite

Geologic mapping and interpretation progressed by leaps and bounds following the recognition of a predictable stratigraphic section at the Bunker Hill Mine and enabled the measurement of specific offsets across major faults, discussed in the following section. From an exploration and mining perspective, there were two critical conclusions from this research: all significant mineralized shoots are hosted in quartzite units where they are cut by vein structures, and the location of the quartzite units can be projected up and down section, and across fault offsets, to targets extensions and offsets of known mineralized shoots and veins.

The rocks of the Bunker Hill Mine have a very complex geologic history. On a mine scale, many of the regional patterns are evident in local folding and fault offsets.

The oldest structural feature evident on the Property is the Tyler Ridge flexure, the anticlinal portion of a parasitic fold on the north flank of a large-scale, northwest-trending fold to the southwest that formed from the D1 event described above. This fold originally trended W-NW, and plunged gently NW (Juras, 1977).

The next significant structural event to affect the rocks was the upwarping of the Big Creek anticline, an E-W trending fold with a slight dip E. The rocks of Bunker Hill are in the north limb of this anticline, which has been overturned to the north due to compressive stress from the south. The axial plane of the Tyler Ridge Flexure has thus been rotated to plunge to the W-NW at -20 to -35 degrees, and the local bedding rotated to be overturned and dipping steeply to the S-SW (Juras, 1977). The Bunker Hill Mine workings lie in the north limb of both the Flexure and the Big Creek Anticline, and mineralization roughly parallels the plunge of the apex of the Tyler Ridge Flexure.

Structural preparation in the form of brecciation along the apexes of folds, bedding-plane shearing and faulting, axial planar fracturing, and flexural cracks in quartzite beds of the Upper Revett formation during these two structural events was undoubtably critical for the emplacement of mineralization. Some workers have concluded that mineralization at Bunker Hill was emplaced contemporaneously with these folding events. Reports by Dwight Juras (1977, 2020) have indicated that siderite-pyrite-sphalerite veins (Bluebird Veins) formed during this W-NW folding event, and later, cross-cutting argentiferous galena-chalcopyrite-pyrite-quartz veins (Galena-Quartz Veins) were emplaced during formation of the E-W trending, north-verging Big Creek Anticline. Others have argued that metals in the CDA Mining District sourced from a shear-zone type base metal + silver mineralizing system, similar to a shear-zone hosted gold deposit, associated with later movement in the Lewis and Clark Structural Zone, with mineralizing fluids taking advantage of the same structural preparation in the quartzite host rocks (White 1994, 2015).

The district-scale Osburn Fault lies immediately to the north of the Bunker Hill Mine workings, striking E-W and dipping steeply south. This fault has had the most recent and significant movement in the CDA Mining District, with up to 16 miles of right-lateral displacement. Because of this movement, and the likely rotation of other fault surfaces and bedding that are cut by it, many of the faults at Bunker Hill appear, in plan view, to be S-SE horsetail splays out of the Osburn Fault. This is not the case

however, as the other faults in the Mine area pre-date the Osburn Fault and resulted from entirely separate and different stress regimes.

The oldest faults at Bunker Hill are N-NW striking, flat to gently SW dipping, and have from 100-1600 ft of reverse offset, generally to the north or east (Towers, Motor, Sierra Nevada and others). These structures host vein mineralization in some areas where crossing preferential quartzite units, but otherwise cut and offset all vein types in the mine (Juras and Duff, 2020). These are the least understood of the faults at the mine, as it is difficult to represent flat-lying structures with traditional geologic mapping methods, and difficult to drill-test these structures from mine workings at similar elevations.

The next faulting event is a series of steeply W-NW striking, south-dipping normal faults with significant offset down to the south. The most prominent of these, the Kruger, Slavonian and Dull Faults from east to west, each have +1000 ft of displacement, and combined with other subparallel faults, the total displacement across these structures is estimated at more than 6000 ft (Farmin, 1977). These faults run subparallel to bedding in the Upper Revett formation, generally staying in the same siltite-argillite bed for great distances until they cross a structural inflection and jump up or down in the section. This factor, along with conspicuously thin zones and limited fault gouge given the amount of displacement, indicates these are largely bedding-slip faults resulting from differential movement between beds during folding. There is a similar set of faults in the hanging wall of the younger Cate Reverse Fault (Marblehead, Buckeye, Ibex and others) that also show down-to-the-south, normal-fault offset. These are likely directly related to the faults in the footwall of the Cate Fault, at least in age and genesis, but the large reverse offset along the Cate Fault has obscured this relationship.

The youngest and most prominent major fault in the Mine is the Cate Fault, a NW-striking, SW-dipping reverse fault with 400 vertical feet of up-to-the-north displacement and some rotational movement. This fault likely formed at the waning stages of the northward-verging folding that produced the Big Creek Anticline and seems to have accommodated a transition from ductile to brittle deformation, possibly due to a shallower depth within the crust after up-warping from folding. The Cate Fault is younger than all major folds, faults and veins in the Bunker Hill Mine. Movement along the Cate Fault, and more recent movement along the Osburn Fault, has caused slight remobilization along many older structures, resulting in small-scale structural textures that have been troublesome to placing actual structural events in the proper chronological order.

Much of the historic production at the Bunker Hill Mine came from W-NW trending, SW dipping veins with sphalerite-pyrite-siderite mineralization ("**Bluebird Veins**") and hybrid mineral bodies where these veins are cut by later NE striking, SE dipping Galena-Quartz Veins, discussed in next section. Because the Cate Fault follows the trend of the Bluebird Veins, it was thought that the Cate Fault and related structures were the plumbing and driving mechanism behind vein emplacement for the first 90 years of mining. Geologic studies towards the end of major mining operations at Bunker Hill in the late 1970's established that movement along the major faults mapped on surface and underground cuts and offsets all know types of mineralization (Juras 1977).

The Bunker Hill Mine has largely exploited mineralization that, in a general sense, can be defined as vein deposits. The vein deposits can be divided into two groups based on cross-cutting relationships, orientation and mineralogy (Juras and Duff, 2020):

**Bluebird Veins:** Earlier event, W-NW striking, SW-dipping, variable ratio of sphalerite-pyrite-siderite mineralization. Associated with axial planar fracturing, flexural cracks, and brecciation in quartzite beds along the hinge line of W-NW trending folds. Where mined, these are thick, tabular zones that have abrupt but gradational margins, with fairly solid zones of sulfide mineralization laterally grading to mineralized sheeted fractures and thin stringers along bedding in adjacent sediments. These "Stringer" zones can be large enough to constitute economic mineralization, as in the Guy Cave, UTZ, Newgard and Quill Zones, but they reflect a second-order control on mineralization.

**Galena-Quartz Veins:** E to NE striking, S to SE dipping, quartz-argentiferous galena +/- siderite-sphalerite-chalcopyrite veins, sinuous-planar with sharp margins, cross-cut Bluebird Veins. Large, hybrid mineralized zones are formed at the intersection of Galena-Quartz Veins with Bluebird Veins, where the Bluebird Vein is enriched in lead and silver by the replacement of siderite by galena.

The CDA Mining District has produced phenomenal quantities of silver, lead and zinc, with significant copper, antimony and cadmium byproducts, and a peripheral belt of small gold deposits to the north. This production has come from a spectrum of deposits that reflect the varying structural, pressure-temperature and geochemical characteristics of the mineralizing systems. Mineralization at the Bunker Hill Mine has similarities to other mines in the CDA Mining District such as the Sunshine, Crescent and Galena, but represents a distinct suite of structural controls and mineralogy that is probably part of a large-scale zonation pattern.

The Bunker Hill Mine workings extend 8,600 feet along strike of the overturned beds of the Upper Revett formation that host the mineralization, extending 7,000 feet downdip parallel to the axial plane of the plunging anticline, covering 5,200 vertical feet from ~3,500 ft msl to -1,700 ft msl. More than 30 individually named deposits were mined historically in separate stopes, with two distinct types of deposits exploited: tabular Bluebird (BB) zones that parallel bedding and are associated with the fold structures, and later Galena-Quartz (GQ) Veins cutting through bedding with sharp walls. The Bluebird Deposits, such as the

March, have been mined for up to 1,400 ft along strike, 4,000 ft downdip, covering 2,400 ft in elevation, with thicknesses of the generally tabular zones up to 150 ft. Galena-Quartz Veins were historically mined along strike lengths of up to 800 ft, and downdip up to 3,700 ft, with mined thicknesses from 5-15 ft.

Virtually all modern metal production at Bunker Hill has come from lead (galena) and zinc sulfide (sphalerite) mineralization, with silver a by-product of lead refining. Historic production in the upper levels of some of the GQ veins came from tetrahedrite (copper-iron-antimony sulfosalt, silver can substitute for copper to create very high Ag values) and cerussite mineralization (lead carbonate, surface weathering product of galena), and silver values in these working likely had some degree of supergene enrichment.

Stopes on the Jersey vein at Bunker Hill encountered oxidized lead-silver mineralization with abundant world-class pyromorphite crystals near their northern extent. Attempts were made to process this material through an oxide circuit at the mill, but the attempts proved to be non-economic. The pyromorphite zone was mined for mineral specimens after the close of major mining operations, and fine pieces from this are undoubtably some of, if not the highest value-per-ton material that has ever been extracted at the Bunker Hill Mine, gracing cabinets at most prestigious mineral museums across the world.

Mineralization at Bunker Hill falls in four categories, described below from oldest to youngest events:

> **Bluebird Veins ("BB"):** W--NW striking, SW-dipping, variable ratio of sphalerite-pyrite-siderite mineralization. Thick, tabular cores with gradational margins bleeding out along bedding and fractures.
>
> **Stringer/Disseminated Zones:** Disseminated, fracture controlled and bedding controlled blebs and stringer mineralization associated with Bluebird Structures, commonly as halos to vein-like bodies or as isolated areas where brecciated quartzite beds are intersected by the W-NW structure and fold fabrics.
>
> **Galena-Quartz Veins ("GQ"):** E to NE striking, S to SE dipping, quartz-argentiferous galena +/- siderite-sphalerite-chalcopyrite-tetrahedrite veins, sinuous-planar with sharp margins, cross-cut Bluebird Veins.
>
> **Hybrid Zones:** Formed at intersections where GQ veins cut BB veins, with open space deposition of sulfides and quartz in the vein refraction in quartzite beds, and replacement of siderite in the BB vein structure by argentiferous galena from the GQ Vein.

Mining efforts at the Bunker Hill Mine focused on different types of mineralization as discovery, technology and metal prices demanded and allowed. Early mining in the late 1800's was focused on outcropping or near-surface, silver-rich Hybrid Zones and Galena-Quartz Veins. With the construction of a lead smelter in 1917 and an electrolytic zinc recovery plant in the 1920's, the Company began to mine larger tonnage, zinc-dominant Bluebird zones such as the Guy Cave and the UTZ, Quill and Newgard Zones. All galena at the Bunker Hill Mine is argentiferous, and the vast majority of the silver that has been recovered over the life of the mine has come from smelting galena. Silver-rich tetrahedrite (freibergite) has been found in some of the shoots on the GQ veins but has not been a major constituent of the overall tonnage.

The four types of mineral zones listed above are truly only two separate structural events: the NW trending Bluebird Veins and the E-NE trending Galena-Quartz Veining. Initial 3D modeling (Rangefront Technical Services 2020) and structural + mineral zonation analysis (Juras and Duff, 2020) has indicated the various vein segments are likely post-mineral offsets of two vein systems that initially comprised four distinct Bluebird Veins and three to five Galena-Quartz Veins.

Although the mineralogy of the two vein types is distinct, and there are significant differences in vein textures and structures that are not germane to this Technical Report, the physical mechanism of both types of mineralization is sulfide minerals filling open spaces (Duff, personal communication, 2020). The creation of intra-bed open space by differential movement of a folded rock package leading to a structurally prepared host rock is one of the main theories regarding the origins of mineralization along these structures (Juras and Duff, 2020).

Quartzite is the primary host to mineralization in all vein types, deposited in open-space caused by refraction of the vein structure as it passes from softer siltite-argillite packages into quartzite units. The vein deflects to cross the quartzite unit more orthogonally, bending to normal with the bedding plane, in essence decreasing the length of quartzite that needs to fracture to continue propagation. Mineralizing fluids ascending the vein structure deposited sulfides in the open-spaces and pressure shadow created by these refractions. Although the veins are commonly mineralized to some degree along their entire length, economic shoots in historic mining operations were largely hosted in these dilated zones in quartzite beds, with the shoot plunging up and down at an orientation defined by the intersection between the vein and bedding (Juras and Duff, 2020).

The largest historically mined stopes were on Hybrid Zones such as the March, which was mined for more than 40 straight years. The large size reflects the open space available to mineralizing fluids, in the form of the refraction shoot created in the quartzite as shown above, and the replacement of siderite (iron carbonate) in the original Bluebird Vein by argentiferous galena from the Galena-Quartz Vein. This essentially replaces portions of the Bluebird vein that are non-metal bearing with lead-silver

mineralization, while leaving the zinc deposited during the BB vein event, creating high-value polymetallic grades of mineralization.

Alteration in the CDA Mining District in general is not as obvious or pronounced as large, predictable zonation patterns that are commonly found around porphyry Cu, epithermal vein Ag-Au, Carlin-Type gold and many other deposit types. There are halos of disseminated sulfide minerals and siderite in wallrock surrounding both BB and GQ vein types, diminishing rapidly away from the vein contact, typically along bedding or pre-existing fractures. Some bleaching is associated with mineralized structures, and limonite staining where they outcrop on surface, but these are largely weathering features on sulfide bearing rocks.

Elsewhere in the CDA Mining District, disseminated carbonate zonation has been observed in vein wallrock, progressing from proximal siderite (iron carbonate) to ankerite (iron-calcium carbonate) to distal calcite (White, 2015). This has not been well documented or commonly observed at the Bunker Hill Mine and so is not currently mapped or modeled.

As it is currently understood and observed, there are no distinct alteration patterns at the Bunker Hill Mine that can be used for detailed exploration targeting, nor any alteration types that would impede potential future mining operations.

The metallic deposits in the CDA Mining District are amongst the most studied in the world due to the prodigious metal production and long history of mining. There are large scale similarities between the deposits as a whole, but each deposit has its own specific structural, lithologic and mineralogical zonation controls. These controls became increasingly well understood at mine-scale across the CDA Mining District in the 1970's and 80's, but regional-scale controls remain enigmatic, conceptual and subject to much academic debate.

In the most general sense, deposits in the CDA Mining District are orogenic, polymetallic veins with lesser disseminated mineralization emanating from the principal veins. There are clearly multiple phases of mineralization, with different causative structural events for each, hosted across the Ravalli Group stratigraphy (St. Regis, Revett and Burke formations) within the CDA Mining District. lead, zinc and silver in varying ratios are the principal metals at all of these deposits, with lesser copper, antimony and cadmium historically recovered.

The veins in the CDA Mining District have been divided into two groups based on metallic mineralogy: a low-silver galena-sphalerite-pyrrhotite-pyrite type, and a high-silver galena-tetrahedrite type (Leach et al., 1998). Prior studies had given ages of 1400-1500 Ma by Pb/Pb isotope modeling of galena from a low-silver type vein (Zartman and Stacey, 1971). In the 1998 Leach Report, gangue minerals from a high-silver type vein were age dated using Ar/Ar and Rb/Sr methods and gave ages as young as ~90-110 Ma). These disparate age dates were explained in that report by two mineralizing events: an earlier low-silver, lead-zinc-silver event during diagenesis and folding in the mid-Proterozoic, and a later high-silver galena-tetrahedrite event in the Cretaceous, associated with emplacement of the Idaho Batholith and smaller, stocks of similar age and composition to those north of the Osburn Fault in the CDA Mining District.

Reports on Bunker Hill Mine geology by Juras and Duff (2020) note two vein types as well (BB and GQ, as described above), that roughly match the compositional differences and have the same age relationships as the two types described by Leach. Juras interprets emplacement of the earlier Bluebird series of veins at the Bunker Hill Mine to be contemporaneous with early W-NW fold development, and the later NE Galena-Quartz veins to represent a separate, more brittle structural event, likely related to the E-W Big Creek Anticline uplift.

Both vein sets at the Bunker Hill Mine exhibit textures typical of orogenic veins, with no boiling textures or sharp textural differences from pressure-temperature changes, nor any significant wallrock alteration other than disseminations of the vein minerals. The huge vertical extent (3,000-6,00ft+) of mineralization typical of all the vein types in the CDA Mining District strongly indicates that all mineralization was emplaced at moderate to deep crustal levels. Juras and Duff note examples of open-space-filling textures in sulfide minerals in veins in their 2020 report, and classify all of the veins at the Bunker Hill Mine as open space fissure veins. If all of these observations hold true, an active fold system is one of the few ways to geologically explain the spaces and pressure shadows necessary to form those open-space cavity-fill textures under the pressures and temperatures present at the time of vein emplacement.

Brian White (1994) has suggested that the entire CDA Mining District is the base metal equivalent of a Shear-Zone hosted gold deposit, with shearing along the Osburn Fault splay of the Lewis and Clark Structural Zone, and heat supplied by the Cretaceous-aged intrusive rocks. In this model the mineralizing fluids travel up metamorphic lineations and take advantage of the same structurally prepared quartzite host rocks and structural pathways as the Juras-Duff model. Since the Juras-Duff Model is built on the same data set currently available to the Company and actively being used for geologic modeling, the fold-associated vein emplacement theory is the geologic model currently being employed to aid exploration and resource delineation drill planning.

**Exploration**

Bunker Hill has a rare exploration opportunity available at the Bunker Hill Mine and has embarked on a new path to fully maximize the potential. A treasure trove of geologic and production data has been organized and preserved in good condition in

the mine office since the shutdown of major mine operations in the early 1980s. This data represents 70+ years of proper scientific data and sample collection with high standards of accuracy and precision that were generally at or above industry standards at the time.

The Company saw the wealth of information that was available, but not readily usable, and embarked on a scanning and digitizing program. From this they were able to build a 3D digital model of the mine workings and 3D surfaces and solids of important geologic features. To add to this, all of the historic drill core lithology logs and assay data (>2900 holes) were entered into a database and imported with the other data into Maptek Vulcan 3D software.

By digitizing geologic maps of the mine levels, and connecting major faults, veins and stratigraphic blocks, it was possible to put into three dimensions ideas that had previously been confined to the brains of Company geologists, plan maps and paper cross-sections with data projected by hand.

There were a number of research programs at the Bunker Hill Mine undertaken in the 1970's to discern lithologic and structural controls on mineralization so as to conduct more effective exploration programs to replace diminishing reserves (White, 1976, Juras, 1977). The Company is now able to apply the knowledge and conclusions from these studies in a far easier and more accurate manner than those which were available to prior generations.

The important lithologic control to mineralization is the quartzite units of the Revett formation. These have now been modeled in 3D from level maps and drill hole data, and post-mineral fault offsets can be reversed to reconstruct the folded position of the host rocks at the time of vein emplacement. Bedding patterns can be matched up at scales that were not noticeable in small-scale detailed field mapping in limited mine drift access. Fault offsets can now readily be determined and measured by positions of stratigraphic blocks. Flat faults that cut all types of mineralization, and were previously difficult to map or project, are now readily apparent in horizontal bends and offsets along units. Not enough work has been done to refine any of the above ideas down to an exact model yet, but the Company has the original data set almost entirely converted to 3D digital format.

Reversing fault offsets to reconstruct original positions has shown that the Bluebird and Galena-Quartz vein segments are offsets of original master structures for each type. Modeling is currently on-going to determine the proper offsets to reconstruct the original geometry of these vein systems at time of emplacement, which will likely identify previously unrecognized vein segments, and provide clues to locate offset segments of historically mined veins that were never found with exploratory drifting or drilling from underground.

The conversion of so many years of geologic work into a format in which all possible data can be isolated and looked at in 3D at the same time, same scale and same color scheme has allowed Bunker Hill Mining Company to rapidly employ the concepts and ideas of prior generations in exploration targeting, and has allowed comparison of data that was not possible with historic, paper-based geologic techniques. The Company intends to evaluate all of the exploration targets proposed in the waning stages of mining with the newly compiled dataset, and test as many of them as fit within the current realities of access and water levels.

Through the use of the now-digitized geologic data, Bunker Hill has been able to conduct exploration drilling between 2020 and 2021, testing some of the proposed structural features. Details on the drilling related to the Quill, Newgard and UTZ zones of mineralization are detailed in section 10 of this report. In addition to both continued geologic digitization and the completed 2021 exploration drill program, the Company has performed a geophysical survey over the summer of 2021.

The survey was conducted as a ground geophysical 3DIP survey through DIAS Geophysical Ltd out of Saskatoon, SK. The Pole-Dipole array featured electrode spacing of 50m, with current injections completed on 100m spacing. Lines were run NE/SW with a spacing of 150m between receiver lines.

The survey was planned to cover a total of ~1,500 acres, but due to delays with challenging terrain, ended up covering just over 1,200 acres. The location of the survey was over the far southwest portion of Bunker Hill's land package, south of all previous historic mine workings and over an area previously un-tested with either geophysical or conventional drilling methods. It is a lithologically diverse section of the property showing outcrops of both lower and middle Belt rocks of the Prichard, Burke, Revett and St. Regis formations. Large reverse and normal faults cross the survey area as well. The dominant structural fabric runs in a NW/SE direction, mirroring that of the known, mapped faults within the historic mine working's footprint to the north. Survey lines were run in a NE/SW direction to traverse this structural orientation as close to perpendicular as possible.

The relatively tight line spacing and 3D nature of the survey allowed for investigation of both Bluebird and Quartz-Galena Vein styles of mineralization. Through initial inversion models, multiple zones of interest were identified. Previous induced polarization ("IP") surveys conducted on the Bunker Hill Mine property in both 1969 (surface over the Cate fault and Upper Bluebird mineralization) and 1968 (down-hole IP on 2 drill holes in the J-Vein area of the mine), indicated that both Quartz-Galena and Bluebird styles of mineralization share a similar IP response of increased conductivity with low resistivities.

Initial data seems to correlate well with previous surface mapping over the surface area both lithologically and structurally. Rocks of the Revett and St. Regis formations lie to the northeast of the Government Gulch fault and can be seen as a variety of IP response levels.

**Drilling**

Drilling began in September of 2020 and in several locations and definition drilling to expand the Bunker Hill Mine resources in the UTZ started in September of 2020 and continued into assay cutoff date of October 10, 2021. This drill program produced 55 holes that were drilled in either the UTZ or Quill-Newgard areas of the mine comprising 20,689 feet of core drilled. Holes were typically drilled at HQ diameter, but for future use as utility passes select holes were drilled at PQ diameter. Much of the drilling was related to the data verification described later in this report. Some exploration drilling occurred from multiple surface locations, with several holes drilled at the historic Homestake portal to expand the UTZ. Also drilled were definition and exploration targets on the 5-level accessed from the Russell tunnel, and exploration targets on the 9-level accessed via the Kellogg tunnel.

Drill pad prep and drill rig mobility logistics were managed on site by a drilling manger from Bunker Hill, supervisory staff from American Drilling Company ("**ADC**") and the onsite Rangefront geologists. A Reflex TN14 gyroscope assisted in lining up the drill rig at the collar. A 50' survey shot was taken during drilling to allow geologists to determine hole viability. Upon reaching the target depth, a geologist observed the core and determined whether to terminate the hole or continue drilling. Upon completion, the survey tool was sent down to take an end of hole survey shot plus one shot every 100' on the way out of the drill hole. These surveys were then approved by the geology team in accordance with industry standard practices and uploaded into the database along with collar locations picked up by the survey team. Throughout the program, Vulcan software was used to plan and modify holes, check proximity to historic workings, evaluate deviation, and assess assay results. At the end of the program, surface holes were grouted in accordance with the Idaho Water Department guidelines.

Rangefront employees and ADC employees ensured security of the core throughout the program. Core was initially held by ADC at the drill rig with the rigs both on the surface and underground on the 5 level. Rangefront employees made daily trips to pick up core and receive a signed chain of custody. On the 9 level, ADC brought the core out the Kellogg Tunnel and it would be signed over to Rangefront at the morning shift change. Winter conditions on mountainous roads eventually necessitated the deposition of core into the core shed by ADC employees.

The core was housed on site in a secure core shed where it was washed, logged, photographed, cut, sampled, and then shipped to an assay lab. Geologic characteristics noted during the logging process included lithology, color, hardness, structure, alteration, observed mineralization, point data and geotechnical data. Rangefront employees ensured Chain of Custody during the entire process.

A portion of one hole was drilled prior to the drill program beginning in September. The hole was re-entered and completed in October of 2020.

**Sampling, Analysis and Data Verification**

This section does not describe sample preparation, analysis or security measures taken prior to the initiation of the 2020-2021 Bunker Hill drill program. Drilling prior to 2020, actually prior to 1991, was conducted by the owners of the mine beginning in 1898. Drilling records have been maintained since that time. Sample preparation, analysis and security records do not exist. Only assay results and geological logging remain as the records. As noted throughout the Technical Report, Bunker Hill's predecessor was among the premier mining companies in the United States. Drilling, muck sampling and data analysis was carried out to the highest standards of the time. Review and approval of results went through a hierarchy of engineers and other professional before being used to estimate mineralization for the mine.

The following describes sample preparation, analysis and security activities conducted by Bunker Hill through 2020-2021.

Drill core samples are cut and prepared by Rangefront employees prior to shipment. Half of the core was returned to the core boxes for archive purposes, while half was inserted into sample bags for shipment to the labs for analysis. Drill core and channel samples were stored in the locked core shed located on the mine site and kept until dispatched to the lab. Access to the core shed is monitored at all times.

Prior to dispatch, core is measured for recovery and sample identification numbers are associated and assigned. Core intervals are photographed for posterity and accuracy. Half core is cut and bagged with the same sample identification number. Assay results are compared against the submitted sample numbers before acceptance of the results.

Throughout the project, multiple analytical laboratories performed assays on the 5,067 drill core and channel samples collected. The quality assurance / quality control protocol in place, in conjunction with the data collected from the laboratories, determined

that ALS Global "ALS" (ISO/IEC 17025:2005) provided the most accurate and repeatable results. Both Paragon Geochemical (ISO/IEC 17025:2017) and American Analytical Services, INC "American" (ISO 17025:2005) were used in the early and mid-stages of the project but failed to yield timely and repeatable results.

Upon arrival, the laboratory crushed, split, pulverized and screened all samples at 200 mesh. ALS then performed a 4-acid digestion assay (ME-OG62) for silver, lead and zinc on the drill core and channel samples. Finalized results reported to an onsite Rangefront Geologist then entered into the geologic database managed by an independent entity. All results in the Technical Report are based on and published with a high level of confidence in the work performed by ALS Global.

Blank material was inserted into the sample sequence at a ratio of 1:20 or roughly every 100' of core/channel sampling. At the start of the project the blank material used was marble Landscaping chips from Ace Hardware. This material failed quality assurance and quality control ("QAQC") due to contamination. Silica sand replaced the marble chips but still showed material contaminations as well. At Bunker Hill's request, the samples sent to Paragon had blank material inserted by the lab. The samples material used were rock chips from a quarry located outside of Sparks, NV. These too had a high baseline for Pb and Zn. Finally, a lab certified blank, OREAS-21e, was used and produced satisfactory and repeatable results. The Ag element did not have the contamination as much as Pb and especially Zn did. OREAS-21e arrives in pre-sized packets of pulverized material and therefore did not undergo the preparatory work done on coarse material.

Certified Reference Materials ("**CRMs**" or "**standards**") were used to monitor the accuracy of the assay results reported by all labs. Standards were inserted into the sample sequence at a ratio of 1:20 or roughly every 100' of core/channel sampling. At the start of the project, two different volcanic hosted massive sulfide ("**VMS**") standards were used from CDN Resource Laboratories Ltd.

In October 2020, Bunker Hill discontinued the CDN standard reference material and began using four different standard materials from Ore Research & Exploration PTY LTD. This material was of meta sedimentary origin and matched theoretical metal grades from the Bunker Hill Mine.

Bunker Hill has initiated a duplicate prepping procedure that involves quartering the core. Half the quarter would be grabbed by hand and put into one bag and the half into another. Due to the nuggety and fractured nature of the mineralization, obtaining an exact duplicate was not achievable. After investigating these results, the core shed obtained a crusher and riffle splitter to make a more homogenic sample for a more accurate duplicate that will tests the labs repeatability. All material not passing QAQC variance limits was re-run through the same analysis suite, along with the preceding and following samples adjacent to the failed sample.

ALS Global testing laboratories are located at 4977 Energy Way, Reno NV 89502. ALS has no relationship with Bunker Hill other than that of a vendor to Bunker Hill.

Mineralization at the Bunker Hill Mine was exploited for over 100 years prior to being shut down due to environmental concerns. A producing polymetallic mine stopped production with blasted mineral inventories in the ground. Documentation of a century of historic estimates remain intact to this day. Production records from hundreds of stopes exist to this day. Quarterly and yearly records of depletion, addition and tracking of material produced and delivered to a mill and two smelters is factual and supported by existing records. The bulk of the mine, known mineralization, and hundreds of production stopes are flooded up to the 11 level. Thousands of records of sampling and drilling exist.

Sampling and drilling assay results were collected to the best standards throughout the history of the mine. Drilling records including surveyed collar coordinates. Driller names and geologist names are recorded. The actual hand-written log from drillhole # 1, drilled in 1898, is still kept on record at the mine. QAQC protocols are not documented.

Bunker Hill expended in excess of $4 million for verification of the nature and existence of mineralization at the mine.

In order to gather data in areas inaccessible to drilling (specifically, historic stopes), Bunker Hill implemented an underground sampling program. Beginning in March 2020, Bunker Hill launched a significant underground sampling program with the intent of verifying historic assays and data located on the mine site. Placer Mining, owner of the Bunker Hill Mine, granted access to the onsite historic data, as well as underground portions of the mine. Underground channel sample collection began on March 28, 2020. Over the following 3 months, a total of 753 samples were collected across ten levels and sub-levels of the mine. Underground sampling concluded on the June 24, 2020. The underground channel, or chip samples, in conjunction with diamond drilling, substantiated the well-documented mineralization of the historic mine.

Initially, two samplers began sampling using methods described below. Within three weeks, the sampling crew grew from two samplers to a team comprising a sample crew chief and six samplers. As the number of samplers increased, a geologist began to accompany samplers underground daily to perform sample layout, assist with the organized collection of samples and review the work performed.

Collection of samples underground involved a multi-step process beginning with the identification of possible sample locations using historic maps. Targeted stopes fell within the boundaries of the UTZ, Newgard and Quill deposits. Scanned mylar maps provided excellent information about underground sample areas. Occasionally, the sample crew discovered an unmapped drift or finger. However, the maps proved to be roughly 95% accurate.

Upon arrival at a sampling location, the geologist began the orientation process by labeling mined out areas and designating each drift, finger, or pillar with a number using spray paint on the ribs. All such labeling was carefully recorded on field maps created from the mylar scans. In several sampling locations, room and pillar methods of mining left pillars that proved both useful in navigating large pillared "rooms" and simultaneously provided opportune sample locations. Once comfortably oriented, the geologist identified specific sampling locations on ribs (and where appropriate, on the back), where samples could be collected perpendicular to the bedding planes of the rock to accurately define the width of a mineralized interval. Inspection of the orientation of the bedding took place at every interval sampled.

While the geologist identified sampling locations within the designated area, samplers barred down loose rock and mitigated for a variety of potential safety hazards. Occasionally, historic mining clutter (pipes, old equipment, timber, etc.) blocked potential sample sites, necessitating its removal prior to sampling.

Sample layout commenced with the geologist and a sampler using a measuring tape reel and spray paint to indicate 5 ft. sample intervals. Vertical lines were painted 5' apart on the ribs, and a single horizontal line connected the two, to indicate to the samplers where to perform the chip sampling. Samples were laid out perpendicular to bedding in 5' sections for as long as there was rock to sample. Prior to painting the ribs, the geologist assessed the stability/safety of each interval. Occasionally, poor ground conditions required skipping an interval where the possibility of rockfall existed. The sampling crew assessed the potentiality for back samples where gaps between the ribs existed. All sample intervals and footages were carefully recorded on field maps.

Initially, samplers approached the sample location with a tarp, a hand sledge and chisel, sample bag, aluminum sample ID tags and a sample tag book. Prior to sampling, the sampler recorded information regarding the sample location including the date, sampler, level and stope, finger/rib/pillar as designated by the geologist, sample interval footage, and rock/mineral description. The sampler wrote the sample ID number on the bag and inserted the paper tag from the sample tag book with the same sample ID into the bag.

Samplers carefully laid the tarp on the sill (floor) beneath the interval to be sampled. Chiseled rock chips removed from the rib or back would fall onto the tarp. Once a sampler removed the appropriate amount of material (between 1 and 10 lbs.) from the sample interval, the chips were collected from off the tarp and placed in the sample bag. The sampler placed the filled sample bag below the sample interval to be photographed and nailed an aluminum tag with the appropriate sample ID number on the right-hand side of the sample interval. Finally, the tarp was removed and cleaned to not cross-contaminate samples, and then moved on to the next sampling interval.

The sampling team quickly realized, however, that the hardness of the host rock (quartzite) significantly hindered the pace of sample collection. The team acquired two battery-operated, hand-held rock saws and, after the geologist performed sample layout, a sampler with the saw made two, 1-inch-deep cuts in the rock roughly an inch apart, providing samplers a consistent edge to chisel easily along the entire sample interval. The rock saw significantly improved the rate of sample collection. And as the number of samplers and rate of sample collection increased, the crew chief, with assistance of the geologist, became responsible for preparing sample bags, recording the sample information, and photographing each interval to streamline the process.

At the end of a day of sampling, the sampling crew removed channel samples from the mine and transferred them to the core shed. As soon as the sampling crew accounted for each sample collected, standards and blanks were prepared and inserted in with the channel samples at a 1:20 interval for both standards and blanks.

After the samples were secured, the sample crew chief and geologist entered the data about each sample taken during the day's sampling into an excel spreadsheet. Furthermore, they documented the precise location of each sample using georeferenced AutoCAD DWG files to generate a sample's X, Y, and Z coordinates. Merging the sample's physical location with the assay data proved useful in following mineralization trends and comparing current data to the historic results.

Throughout the underground sampling program, a number of safety and logistical constraints dictated sampling locations. The sampling crew navigated issues such as high backs, unstable or faulted ribs and pillars, poor air quality and gases, ground support, standing bodies of water, areas filled with waste rock, poor ground conditions, undetonated historic explosives, and gaping holes in the back or sill. Samplers frequently consulted with the mine safety manager and, where possible, found a way to safely collect samples. Occasionally, no viable solution to remedy safety issues required samplers to forego sampling in a desired location. Despite the obstacles, no safety incidents occurred during the 3 months of underground sampling.

Of the 753 channel samples collected, 749 samples contained measurable amount of mineralization. The grades of Ag, Zn and Pb very closely matched the historic production car sample grades.

During a cleanup of a storage warehouse, 758 unoxidized, well-kept pulp envelopes were discovered. The pulps were labeled and associated with the final drilling programs at Bunker prior to closure. The pulps are associated with the Quill and Newgard deposits which are the subject of this report. The pulps were submitted for assaying along with standards and duplicates to ensure proper QAQC protocols were followed.

**Mineral Processing and Metallurgical Testing**

This section summarizes and provides documentation for the metallurgical and process design work that has been performed on the Bunker Hill Mine project through to May 2022. This includes a review of the operating history, a review of historical metallurgical test work used to support various studies, an analysis of the current test work program results as well as recommendations for future testing.

Production at the lead, silver, and zinc Bunker Hill Mine began in 1887, lasted 95 years, and included a zinc refinery beginning in 1927. The Bunker Hill Mine concentrator, which processed 2,400 tpd, consisted of two-stage crushing circuit to produce feed for the ball mills. The ground product was sequentially floated, namely lead first followed by zinc minerals. Both lead and zinc rougher concentrates were cleaned twice to produce marketable-grade products. The plant description indicated the flotation reagents employed were sodium cyanide, zinc sulfate, lime, copper sulfate, xanthate and methyl isobutyl carbonyl. The same reagents are commonly used today for processing of polymetallic mineralization. The lead concentrate assayed ±64% Pb, 40 opt Ag and 5% Zn. The zinc concentrates assayed ±55% Zn, 3 opt Ag and 1% Pb. The feed grades were not reported.

Bunker Hill contracted Resource Development Inc. ("**RDi**") to conduct a scoping level metallurgical study to evaluate metal recovery for the Bunker Hill Mine project. The primary objective of the test program was to complete metallurgical test work on three samples designated Newgard, Quill and Utz to be included in the Pre-feasibility Study ("**PFS**") for the Bunker Hill Mine project. The test program built upon knowledge gained during initial scoping level testing and historical production data.

The main objectives of the test work included the following:

1. establishing a process flowsheet for lead and zinc recovery that maximizes recovery while maintaining high concentrate grades; and

2. simulating plant operations with locked cycle flotation testing and characterize final concentrates for marketing purposes.

RDi received approximately 500 kilograms of sample for metallurgical testing from the UTZ portion of the mine, collected by hand from 2x 4' deep, 12' wide panel shots off the rib. The UTZ sample location represents the standard style of mineralization to be expected throughout the remainder of the UTZ, Newgard and Quill mineralized zones. Spatial variation, both along strike and down plunge, of the mineralized zones show little to no variation in relative abundance of certain metal-bearing minerals versus other locations outside of the inherent grade variabilities further discussed below. Host rock and structural features in the UTZ are also representative of the mineral deposit as a whole. 10x 5-gallon buckets of sample were collected from each panel, which were subsequently split in half to produce a master composite for testing. The other half of each bucket was retained for variability testing. Representative pieces of rock were selected from each bucket for in-place bulk density testing. The master composite sample was crushed to nominal 1 inch and a representative split was taken for abrasion testing. The remaining sample was crushed to $P_{100}$ passing 6 mesh, blended, and split into charges for testing. A representative sample of the master composite was pulverized and submitted for head analysis.

The head assay results indicate that the master composite sample contained 4.1% lead and 6.4% zinc; precious metals are present with approximately 0.45 g/mt Au and 49.7 g/mt Ag; the sample is high in sulfur with most of the sulfur present as sulfide sulfur; and arsenic content was significantly higher than previously tested samples at 0.86% As.

The master composite sample was submitted for mineralogical analysis. The sample consists of mostly sericitic quartzite, but nearly half of the sample is made up of sulfides. Sphalerite is the dominant sulfide and occurs in liberated grains at several millimeters in size and as inclusions in quartz, pyrite, and galena at 1 to 50 microns.

Galena and pyrite are found in similar quantities. Large galena grains exhibit inclusions of pyrite, chalcopyrite, and tetrahedrite up to 50 microns in size. Galena is also found as inclusions in quartz, pyrite, and sphalerite of up to 75 microns. Arsenopyrite occurs in quartz, pyrite, sphalerite, and galena, with grain sizes ranging from 1 to 100 microns. Few large aggregates of arsenopyrite are present.

The in-place bulk density was determined for each received bucket by weighing each sample after drying and then weighing the sample while it was submerged under water to determine the volume of water displaced. The samples were coated in wax to ensure water did not penetrate the samples. The bulk density (SG) averaged 2.79 for the NE samples, and 2.77 for the SW samples.

A Bond's Ball Mill Work Index ("**BWi**") was determined for the master composite sample at a closed size of 100 mesh (150 microns). In addition, a sample was submitted for Bond Abrasion Index testing at Hazen Research Inc. The BWi result was 13.47 kWh/st, while the Ai was determined to be 0.6137. The results indicate that the sample would be considered medium hardness and very abrasive. Subsequent BWi tests conducted by SGS Canada Inc at Lakefield ("**SGS**") resulted in similar results.

Initial rougher flotation tests were completed with 1-kilogram charges of the master composite sample. Testing utilized a differential flotation approach to produce separate lead and zinc concentrates. The zinc was depressed with a variety of reagents while the lead was floated. After the lead flotation, zinc was activated with copper sulfate and then collected with SIPX. The primary grind was varied from $P_{80}$ 100 mesh to $P_{80}$ 200 mesh to determine liberation characteristics. Additional rougher flotation tests were conducted without sodium cyanide and with the use of premade zinc cyanide instead of the standard separate additions of sodium cyanide and zinc sulfate. All test products were submitted for assay of gold, silver, lead, and zinc.

The scoping level rougher flotation test results indicate the following:

- The differential flotation approach was successful at producing separate lead and zinc concentrates. Finer grinding produced slight improvements in lead, silver, and gold recovery in the lead rougher concentrate. The amount of zinc reporting to the lead rougher concentrate also slightly increased, while the grade of the zinc in the zinc concentrate also increased. Rougher concentrate lead grades in the lead concentrate ranged from 13.8% Pb to 17.6% Pb, while the zinc grades in the rougher zinc concentrate ranged from 29.0% Zn to 34.6% Zn.
- All tests exhibited similar overall zinc recovery of >98%. Zinc reporting to the zinc concentrate ranged from 71.2% to 80.3%, with the highest values at the finer particle sizes and without the addition of Aero 3418A to the lead circuit.
- All tests exhibited similar total lead recovery of >92%. Lead reporting to the lead concentrate ranged from 84.1% to 92.8%, the highest values at the finer particle sizes and with the addition of AP242 to the lead circuit.
- The majority of precious metals reported to the lead concentrate. Total recovery of silver was >97% with approximately 87% reporting to the lead concentrate. Total gold ranged from 85.8% to 94.4%, with as much as 78% reporting to the lead concentrate. Caution should be raised that this gold could routinely be associated with the entrained arsenic, as arsenopyrite. The high arsenic content in the lead concentrate creates placement challenges and penalties. Ongoing test work will focus on arsenic depression and further characterize gold deportment.
- The addition of more zinc depressants did not significantly affect the overall flotation results but did slow the kinetics in the lead circuit (FT5). The substitution of AP242 in place of Aero 3418A increased the mass pull and recovery of all metals into the lead concentrate, including zinc (FT4). The exclusion of Aero 3481A provided a slight decrease in the amount of zinc reporting to the lead concentrate and slowed the kinetics in the lead circuit (FT6).
- Kinetic samples indicate the majority of lead is floated in the first minute of flotation time and approximately 89% of the lead can be floated in three minutes of flotation time with a grade of 20.3% Pb at a particle size of $P_{80}$ 150 mesh. The zinc grade continues to increase as the lead flotation continues. It would be best to limit the rougher lead flotation to three minutes and additional flotation residence time would be considered the rougher scavenger that is sent to the regrind circuit.
- Zinc cyanide was as effective at depressing zinc in the lead circuit as the combination of sodium cyanide and zinc sulfate utilized in previous tests. Overall metal recoveries and the amount of lead and zinc reporting to the zinc circuit were also similar. The removal of cyanide resulted in approximately 7% additional zinc reporting to the lead concentrate.

Additional rougher flotation tests were completed with 1-kilogram charges of the master composite sample to investigate the addition of all depressants directly to the grinding mill instead staged addition to the mill and rougher flotation stages. Testing utilized the standard differential flotation approach to produce separate lead and zinc concentrates at a primary grind to $P_{80}$ 200 mesh. The zinc was depressed with the standard dosage of depressants (FT22), and 1.5X depressants (FT23). All flotation products were submitted for assay of gold, silver, lead, zinc, arsenic, iron, and sulfide sulfur.

The results from additional rougher tests were similar to previous tests with slightly higher lead grade and lower zinc grade in the lead rougher concentrate. Additional depressants made another slight improvement to concentrate grades. Metal recoveries were similar to previous rougher flotation tests.

Cleaner flotation tests were completed to evaluate various primary grinds, reagents, regrinds, and splitting of the rougher and scavenger concentrates. Initial cleaner tests were completed with individual lead and zinc rougher concentrates to simulate the historic operation flotation process. Rougher concentrate was produced from 2-kilogram charges at grinds of both $P_{80}$ 150 mesh and P80 200 mesh. Lead promoters 3418A and AP242 were also evaluated. The rougher concentrates for both lead and zinc were collected for 2 minutes of flotation time, while the rougher scavenger concentrates were collected for an additional 3 minutes of flotation time. The lead and zinc rougher concentrates were then individually cleaned with two stages of cleaners without regrind. The lead and zinc rougher scavenger concentrates were combined and reground to P80 325 mesh. The reground, combined scavenger concentrate was then refloated utilizing rougher flotation conditions to simulate recirculation back to the rougher cells.

A second set of cleaner tests were completed that combined the rougher and scavenger concentrates for both lead and zinc. Concentrate was produced with 2-kilogram charges at primary grinds of P80 200 mesh and P80 270 mesh and lead promoter AP242. The combined rougher scavenger concentrates were then cleaned with three stages of cleaners, with and without regrind to $P_{80}$ 325 mesh. All test products were submitted for assay of gold, silver, lead, and zinc.

A third set of flotation tests were completed to investigate increased depression of arsenic and other gauge minerals during the rougher and cleaning stages. Combined rougher/scavenger concentrate was produced during bulk flotation testing utilizing the standard flotation conditions (primary grinds of $P_{80}$ 270 mesh SIPX, AP242, $CuSO_4$) for tests FT15-FT17. The lead and zinc concentrates were cleaned with three stages of cleaners, with a lead circuit regrind to approximately $P_{80}$ 400 mesh. Depressants in the lead regrind/1st cleaner were added at the standard amount for the first test (FT15), 1.5 times the standard amount for the second test (FT16), and 2 times the standard amount for the third test (FT17). Depressant additions were doubled in the 2nd stage of lead cleaners for all tests. The pH was adjusted to 12 with hydrated lime during all zinc cleaner stages for all tests in this series to depress arsenopyrite and pyrite. Lead rougher and cleaner tests were completed utilizing the standard conditions to evaluate soda ash as a pH modifier and to develop baseline arsenic grades for additional composites with various arsenic head grades (FT18-21). All of these test products were submitted for assay of gold, silver, lead, zinc, and arsenic. Full ICP metals and XRF analysis were completed on the final lead and zinc concentrates.

The cleaner flotation test results indicate the following:

- Cleaner flotation tests with non-reground rougher concentrates indicate higher metal recovery and higher concentrate grades were produced at a primary grind of $P_{80}$ 200 mesh. Two stages of cleaners at the finer grind produced overall lead recovery in the second lead cleaner concentrate of 78.7% at a grade of 43.6% Pb and zinc recovery in the second zinc cleaner concentrate of 66.7% at a grade of 51.0% Zn.
- Cleaner flotation tests with combined rougher/scavenger concentrates indicate slightly higher metal recovery and higher concentrate grades with reground concentrates as compared to finer primary grind and no regrind. A primary grind of $P_{80}$ 200 mesh and regrind to $P_{80}$ 325 with three stages of cleaners produced lead concentrate of 48.5% Pb and zinc concentrate of 58.1% Zn as compared to 44.3% Pb and 52.8% Zn with a primary grind of $P_{80}$ 270 mesh and no regrind. Less zinc reported to the lead concentrate with the primary grind at $P_{80}$ 270 mesh. Primary grind of $P_{80}$ 270 mesh and regrind to $P_{80}$ 325 mesh produced a lead grade of nearly 60% Pb with three stages of cleaners, but only 40% of the lead reported to the cleaned concentrate.
- Rougher flotation results for the cleaner tests produced similar overall recoveries to the initial rougher flotation series, with approximately 95% lead and 98% of the zinc recovered into concentrates. Finer primary grinds collected more lead and less zinc into the lead rougher concentrate and more zinc into the zinc rougher concentrate. The use of AP242 increased the recovery of lead and zinc into the lead concentrate and decreased the metal grades due to the additional mass. Approximately 95% of the lead and 22% of the zinc were recovered into the lead rougher concentrate and 75% of the zinc into the zinc rougher concentrate at a primary grind of $P_{80}$ 200 mesh and the use of AP242.
- Regrinding the combined lead and zinc rougher scavenger concentrates and re- floating to simulate recycle to the rougher flotation did not significantly improve the concentrate grade. The majority of the lead and zinc reported to the lead concentrate since the activated zinc could not be depressed to the zinc concentrate with high dosages of reagents. Approximately a third of the rougher scavenger mass was rejected to the rougher tail which accounts for approximately 0.5% of the overall metal recovery.
- Arsenic test work indicates that arsenic grade in the final lead concentrate is similar to the grade observed in the lead rougher concentrate for the current master composite as well as the Quill and UTZ composites from the previous test program. Approximately 50%-60% of the arsenic is recovered into the lead rougher concentrate even with additional depressants in the rougher circuit.
- Higher depressant additions in the lead cleaner circuit of the master composite increased the lead grade in the 3rd Pb cleaner concentrate from a baseline grade of 43.3% Pb to 50.8% Pb. Arsenic grade in the cleaned lead concentrates was not significantly changed with additional depressants in the lead rougher or cleaner circuits, or with the use of soda ash for pH control. Slight improvements in lead and zinc recovery were observed with higher depressants.

A locked-cycle flotation test was completed with the optimum cleaner flotation flow sheet to forecast concentrate grade and precious metal recovery expected during plant operation. The locked-cycle test consists of running multiple flotation tests and recycling each cleaner tail into the previous flotation stage during the next flotation test/cycle. A total of six cycles were completed to ensure that the process was at steady state. In addition to the locked-cycle test, a one cycle open-cycle test (FT14) was completed to correlate open-cycle results to locked-cycle results. The same conditions were utilized for both open-cycle and locked-cycle tests.

The open-cycle and locked-cycle tests were completed at a primary grind of $P_{80}$ 270 mesh for rougher flotation. Rougher scavenger flotation was included in both the lead and zinc circuits to increase the amount of value sent to the cleaner stages. Regrind of the lead rougher concentrate with a pebble mill was completed to a particle size of approximately $P_{80}$ 400 mesh for cleaner flotation. No regrind was completed with the zinc rougher concentrate.

The lead and zinc circuits were separated during the locked-cycle testing with the exception of the lead cleaner 1 tails recycled to the zinc rougher flotation to increase the zinc recovery. The rougher concentrate was then fed to the 1st cleaner flotation. The 1st cleaner flotation included a scavenger flotation stage in which the concentrate would be recycled back to the 1st cleaner flotation for the next cycle. The concentrate from the 1st cleaner was then cleaned during the 2nd cleaner flotation. The 2nd cleaner tails were recycled back to the 1st cleaner flotation for the next cycle. The concentrate from the 2nd cleaner was then cleaned during the 3rd cleaner flotation. The 3rd cleaner tails were recycled back to the 2nd cleaner flotation for the next cycle. The results of the locked-cycle testing are displayed in Table 1 below.

**Table 1 – Summary of Locked-Cycle Flotation Test Results**

| Product | Overall Weight % | Overall Pb Recovery % | Overall Zn Recovery % | Overall Au Recovery % | Overall Ag Recovery % | Conc. Grade Pb (%) | Conc. Grade Zn (%) | Conc. Grade Au (g/mt | Conc. Grade Ag (g/mt) |
|---|---|---|---|---|---|---|---|---|---|
| Lead 3rd Cleaner Conc. | 7.1 | 88.2 | 9.2 | 47.8 | 84.2 | 47.6 | 6.91 | 2.16 | 410 |
| Zinc 3rd Cleaner Conc. | 8.7 | 3.5 | 85.1 | 16.7 | 10.9 | 1.55 | 52.4 | 0.62 | 43.5 |
| Rougher Tail | 80.7 | 5.3 | 3.2 | 25.5 | 0.9 | 0.25 | 0.21 | 0.10 | 0.40 |
| Zinc 1st Cleaner Tail | 3.6 | 2.9 | 2.5 | 9.9 | 3.9 | 3.14 | 3.71 | 0.89 | 37.7 |
| Combined Tails | 84.2 | 8.3 | 5.7 | 35.5 | 4.9 | 0.38 | 0.36 | 0.13 | 1.99 |
| Calculated Head | 100.0 | 100.0 | 100.0 | 100.0 | 100.0 | 3.78 | 5.25 | 0.32 | 34.0 |

The locked-cycle flotation results indicate the following:

- Locked-cycle testing recovered 88.2% of the lead into the lead cleaner concentrate at a grade of 47.6% Pb, and 85.1% of the zinc into the zinc cleaner concentrate at a grade of 52.4% Zn. Final concentrate analysis shows a zinc concentrate grade of 57.36% Zn and lead concentrate grades of 46.25% Pb and 416 g/mt Ag. The product grades were similar to the open-cycle results, but the locked-cycle recoveries were higher due to the recycling of tails. The highest lead losses were in the final tails (8.3%), while the majority of zinc losses were from zinc left in the lead circuit (9.2%).
- The majority of precious metals were recovered in the lead cleaner concentrate with 47.8% of the gold and 84.2% of the silver reporting at grades of 2.16 g/mt Au and 410 g/mt Ag. The zinc cleaner concentrate contained 16.7% of the gold and 10.9% of the silver.
- Smelter penalty analysis of the sixth cycle cleaned concentrates indicated the arsenic was the highest contaminate at 3.87% As in the lead concentrate and 1.35% As in the zinc concentrate.

Select cleaner flotation concentrates were submitted for mineralogical analysis to determine the content and liberation size of the metals in the concentrates. Lead Cleaner 3 concentrates produced at various grinds were submitted (FT12-primary grind 200 mesh, regrind 325 mesh, FT13-primary 270 mesh/regrind 325 mesh, LCT primary 270 mesh/regrind 400 mesh) as well as the LCT Zinc Cleaner 3 concentrate. The mineralogy results were similar for the three lead concentrates that were analyzed. The main liberated contaminates in the lead concentrates were pyrite and sphalerite. These minerals were also the major contaminates attached to galena. Nearly all of the arsenopyrite was liberated from the galena at a content of approximately 6%. A small amount of quartz was found in the lead concentrate (<5%), while most of the concentrate was made up of sulfides. The contaminates generally decreased with finer grind.

The zinc concentrate contained mostly sphalerite, with small amounts of pyrite, galena, arsenopyrite, and quartz. Petrographic studies in conjunction with XRD indicate the sample contains 1% total galena, however, no liberated galena is identified. Galena occurs as minute inclusions or attachments in pyrite and sphalerite with a grain size that varies from 1µm to 10µm in size.

Bunker Hill has contracted SGS to conduct a metallurgical study to further evaluate and optimize metal recovery for the Bunker Hill Mine project. The primary objective of the test program is to complete metallurgical test work to improve met results over the PFS performed by RDi for the Bunker Hill Mine project.

The main objectives of the test work included the following:

1. establishing a process flowsheet for lead and zinc recovery that maximizes recovery while maintaining high concentrate grades; and

2. targeting significant operating improvements such as rougher flotation at a coarse grind size, minimizing entrainment of sphalerite and arsenopyrite in the lead concentrate, and entraining of galena in the zinc concentrate.

During this test program, SGS reviewed the RDi and historical test work and investigated if the current flowsheet was suitable for this deposit outlined in the mine plan. A series of flotation tests were performed to reconfirm historic results and determine if alternative flowsheet conditions can be found resulting in improved metallurgical performance and operational efficiency. Various particle sizing, pH levels, reagent screening, and different flowsheet configurations were explored to evaluate metallurgical performance of the deposit. Mineralogy and grindability test work was also performed to complement flotation test work. Based on the study, the test conditions of the locked cycle test were confirmed, and 6 cycles (A-F) of the tests were performed.

The locked cycle testing performed well and produced the high-quality lead and zinc concentrates. The grade of lead in the lead concentrate was 59.5% and the zinc in the zinc concentrate was 57.5%. The iron and arsenic in the lead concentrate were very low, they were 7.7% and 0.7%, respectively. The iron and arsenic in the zinc concentrate were also very low, they were 4.19% and 0.2%, respectively.

However, the zinc recovery was lower than expected. One of the reasons was the mass pull. Cycles E and F had very high zinc grade in the final tails and the mass pull was lower (higher mass of the tailings). Therefore, it is suspected that the zinc rougher wasn't run properly during the cycles E and F. Since the locked-cycle test result was averaged from the cycle D, E and F, high zinc in the tails from the cycle E and F really impacted the zinc recovery significantly.

The following conclusions can be drawn based on the test work completed to date:

- The master composite sample contains 4.1% lead and 6.4% zinc. Precious metals are present with approximately 0.45 g/mt Au and 49.7 g/mt Ag. The sample is high in sulfur at 7.58%, with most of the sulfur present as sulfide sulfur. Arsenic content was significantly higher than previously tested samples at 0.86% As.
- Mineralogical analysis of the master composite sample indicated that nearly half of the sample is made up of sulphides. Sphalerite is the dominant sulfide and occurs in liberated grains at several millimeters in size and as inclusions in quartz, pyrite, and galena at 1 to 50 microns. Galena and pyrite are found in similar quantities. Large galena grains exhibit inclusions of pyrite, chalcopyrite, and tetrahedrite up to 50 microns in size. Galena is also found as inclusions in quartz, pyrite, and sphalerite of up to 75 microns. Arsenopyrite occurs in quartz, pyrite, sphalerite, and galena, with grain sizes ranging from 1 to 100 microns.
- In-place bulk density (SG) testing of coarse ore samples ranged from 2.61 to 3.08 with an average of 2.78.
- Bond Ball Mill Work Index and Bond Abrasion Index testing of the master composite indicate that the sample would be considered medium hardness and very abrasive. BWi was 13.47 kWh/st at a closed size of 100 mesh (150 microns), while the Ai was 0.6137.
- The differential rougher flotation approach was successful at producing separate rougher lead and zinc concentrates. Initial testing indicated a maximum of 92.8% of the lead with 24.8% of zinc reported to the lead rougher concentrate, while a maximum of 80.3% of the zinc reported to the zinc concentrate. Most precious metals reported to the lead rougher concentrate with approximately 87% of the silver and 75% of the gold.
    - Grind series rougher flotation testing indicated that finer grinding produced slight improvements in lead, silver, and gold recovery in the lead rougher concentrate, while reducing the amount of zinc reporting to the lead rougher concentrate.
    - Evaluation of various zinc depressants and dosages indicate slight differences in concentrate grade and metal recovery. Zinc cyanide was as effective at depressing zinc in the lead circuit as the combination of sodium cyanide and zinc sulfate utilized in initial tests. Increased addition of zinc depressants did not significantly affect the overall flotation results. Adding no cyanide for zinc depression resulted in approximately 7% additional zinc reporting to the lead concentrate. Addition of all depressant dosages to the primary grinding mill did not significantly affect the metal grades and recoveries.
    - Evaluation of various collectors in the lead rougher circuit indicate that the metal and mass recovery increases slightly when going from SIPX, to SIPX/Aero 3418A, and even more with SIPX/AP242. The combination SIPX/AP24 provided the highest lead recovery to the lead rougher concentrate, but also the highest zinc content.
    - Kinetic testing indicated that 3 minutes of laboratory flotation time for the lead rougher recovers approximately 90% of the lead. The zinc grade continues to increase as the lead flotation continues and the flotation time should be limited.

- Cleaner flotation testing indicated multiple cleaner stages and regrind are needed to produce marketable concentrates. Three stages of lead cleaners with regrind produced low grade (<50% Pb) lead concentrate with high zinc content (>5% Zn). Three stages of zinc cleaners without regrind produced reasonable grade (>50% Zn) zinc concentrate. Arsenic is the major contaminant in the cleaned concentrates, with the final SGS concentrate elemental analysis values being used in the economic analysis and deleterious element factors of the Technical Report.
    - Testing of the historic flowsheet (individual cleaner flotation circuits for lead rougher and zinc rougher with combined lead and zinc scavengers to single regrind) returned high levels of zinc back to the lead circuit since the activated zinc could not be depressed to the zinc concentrate with high dosages of reagents. Scavenger concentrates were combined with their respective rougher concentrates for the remainder of testing.
    - Cleaner flotation tests with combined rougher/scavenger concentrates indicated that lead rougher concentrate benefits from regrind to $P_{80}$ 400 mesh, while the zinc rougher concentrate may not need to be reground if the primary grind is $P_{80}$ 200 or finer.
    - Higher depressant additions in the lead cleaner circuit increased the lead grade of the final concentrate. Arsenic grade in the cleaned lead concentrates was not significantly changed with additional depressants in the lead rougher or cleaner circuits, or with the use of soda ash for pH control. Slight improvements in lead and zinc recovery were observed with higher depressants.
    - Locked-cycle testing recovered 88.2% of the lead (94.7% of rougher recovery) into the lead cleaner concentrate at a grade of 47.6% Pb, and 85.1% of the zinc (95.9% of zinc rougher recovery) into the zinc cleaner concentrate at a grade of 52.4% Zn. The highest lead losses were in the final tails (8.3%), while most zinc losses were from zinc left in the lead circuit (9.2%). Some improvements to these results can be obtained in the commercial operation with fresh feed as noted for several polymetallic operations between laboratory and plant results.
    - Locked-cycle testing indicated that the open-cycle cleaner tests could reasonably predict metal grades but underestimate the metal recoveries due to recycling of streams during locked-cycle testing. Based on these results, one can predict the results of locked-cycle tests from open-circuit tests.
- Arsenic test work indicated that arsenic grade in the final lead concentrate is like the grade observed in the lead rougher concentrate for the current master composite as well as the Quill and Utz composites from the previous test program. Approximately 50%-60% of the arsenic is recovered into the lead rougher concentrate even with additional depressants.
- Mineralogical analysis of cleaned concentrates indicated that the lead concentrate contained liberated and non-liberated pyrite and sphalerite with small amounts of quartz. Nearly all arsenopyrite was liberated from the galena. The contaminants generally decreased with finer grind. The zinc concentrate contained mostly zinc, with small amounts of pyrite, galena, arsenopyrite, and quartz.

To the extent known, there are no processing factors or deleterious elements that will have a significant effect on the Project economics or salability of concentrate products. YaKum has confirmed that final concentrate grades realized through the RDi lock cycle testing were not representative of those historically seen at the Bunker Hill Mine and concentrator plant. Through the initial test work at SGS, it is confirmed that the use of historical concentrate metal grades be used for mineral resource and economic analysis in the Technical Report.

**Mineral Resource Estimates**

Mineral resource estimates ("**MRE**") for the Bunker Hill Mine were determined by using inverse distance weighting techniques for the Quill, Newgard and UTZ mineralization bodies. Mineral assays were derived from the 2020 drilling program, historic drilling, historic production car samples and channel samples gathered during the summer of 2020. MREs were determined according to The Canadian Institute of Management ("**CIM**") Estimation of Mineral Resources and Mineral Reserves Best Practice Guidelines. Mineral resources (as defined in NI 43-101) have been reported in accordance with the disclosure obligations under NI 43-101.

Table 2 below summarizes the Bunker Hill MRE, inclusive of Mineral Reserves (as defined in NI 43-101), classified according to CIM definitions for the Bunker Hill Mine project. Reasonable prospects of eventual economic extraction assume underground mining, mill processing and flotation of Pb and Zn concentrates. MREs are reported at a net smelter return ("**NSR**") cutoff of $70 per ton.

NSR is defined as the return from sales of concentrates, expressed in US$/t, i.e.: NSR = (Contained metal) * (Metallurgical recoveries) * (Metal Payability %) * (Metal prices) – (Treatment, refining, transport and other selling costs). NSR values are estimated using updated using metallurgical recoveries of 85.1%, 84.2% and 88.2% for Zn, Ag and Pb respectively, and concentrate grades of 58% Zn in zinc concentrate, and 67% Pb and 12.13 oz/ton Ag in lead concentrate.

Mineral resources are not mineral reserves and do not have demonstrated economic viability. There is no certainty that all or any part of the mineral resources will be converted to mineral reserves.

**Table 2 - Bunker Hill Mine Mineral Resource Estimate Inclusive of Mineral Reserves – NSR $70/ton cut off Ag selling price of $20/oz (troy), Lead selling price of $1.00/lb, Zn selling price of $1.20/lb. Effective date of August 29, 2022**

| Classification | Ton (x1,000) | NSR ($/Ton) | Ag Oz/Ton | Ag Oz (x1,000) | Pb % | Pb Lbs. (x1,000) | Zn % | Zn Lbs. (x1,000) |
|---|---|---|---|---|---|---|---|---|
| Measured (M) | 2,374 | $ 119.60 | 1.01 | 2,404 | 2.46 | 116,574 | 5.37 | 254,811 |
| Indicated (I) | 4,662 | $ 119.81 | 1.00 | 4,657 | 2.37 | 221,295 | 5.48 | 510,964 |
| **Total M & I** | **7,036** | **$ 119.74** | **1.00** | **7,061** | **2.40** | **337,869** | **5.44** | **765,774** |
| Inferred | 6,943 | $ 126.28 | 1.52 | 10,532 | 2.87 | 398,901 | 4.96 | 688,482 |

Mineral resources are inclusive of mineral reserves. The reader is cautioned not to add mineral reserves discussed herein to the mineral resources in Table 2 above.

The Qualified Person for the above estimate is Scott Wilson, C.P.G., SME. Mineral resources that are not mineral reserves do not have demonstrated economic viability. Columns may not add up due to rounding.

Project mineralization extends to great depths accessible by a complicated system of shafts to access levels and mine development headings. The mine is flooded up to the 11 Level of the mine. Other than pumping water according to EPA requirements, and limited care and maintenance, access to the depths of the mine has not been accessible since 1989. For these reasons, nearly half of the estimated mineral resources are considered to be inferred mineral resources.

The entire length of the MRE is assumed to be geologically continuous but differing in orientation due to underlying lithological constraints and faults. In order to constrain the MRE, three separate mineral domains were constructed to segregate the continuous mineralized zone comprising the UTZ, Quill and Newgard deposits. Mapping shows that fault structures offset but do not truncate mineralization between the Quill, Newgard and UTZ. Historically, the Quill-Newgard zone of mineralization was mined as a continuous mineralized body and has been constructed as a single domain solid ("**QN**").

UTZ was mined as multiple stope blocks separated by the Cate fault which runs roughly parallel to trend of mineralization in the UTZ. Both the hanging wall and foot wall of UTZ was mined, but stopes rarely crossed between the two zones. UTZ has been defined as two domains; the Cate hanging wall ("**CHW**") and the Cate foot wall ("**CFW**") domains.

The stopes and workings were surveyed during production and drafted on to mylar sheets. The Mylar sheets were recently digitized by Rangefront and converted to solid triangulations. In general mineralization strikes S070E with a nearly vertical dip.

Nearly 2,500 vertical feet of continuous mineralization is present in UTZ, Newgard and Quill deposits. All areas between the existing stopes have been estimated using a block model and ID3 estimation techniques. A resource constraining shell has been explicitly designed around known mineralization and used as a limit to resource estimates for the Bunker Hill Mine project. Continued exploration drilling and geological modelling is required to expand mineralization.

A single database of composites was used for the MRE. Data for the composites was generated from production car samples, channel samples and core drilling data. Production car samples are used alongside channel samples and drill data as they were found to closely represent mineralization in place as detailed in the Technical Report.

Utilizing the flag identifier for assay intervals included in each of the domains, capping values were decided based on a per-metal, per-domain basis. Capping was assigned prior to compositing to better reflect actual assayed intervals. Intervals were extracted, and then used to construct CDF plots to look at the upper end assay values and correlation to the rest of the data set. Overall, all groups showed strong correlation throughout the assay value range indicating that capping values should lie close to the upper limit of received values.

After the capping values were determined, the capped field in the database was run through a script designed to adjust all negative and "0" value assays to ½ of the lower detection limit of the assay method for that element, or for historic data, the lowest value assigned in historic logs representing the lowest detection limit at that time for that element.

Subsequent to capping, 5-foot composites were generated for each of the three metals Pb Ag and Zn. There are far fewer Ag values than there are Pb or Zn values in the database. Prior operators did not assay for Ag. Historically Ag was considered a by-product only.

Composites were broken on the domain and geologic boundaries. Production car samples are digitized as point data and were appended directly into the composited database without length adjustment.

Assay data is rarely collected randomly. This is certainly true for assays related to underground mining operations where samples are collected every five feet in crisscross patterns such as Bunker Hill Mine. Large amounts of higher-grade areas contain the most assays. The data is important and should not be changed, but there is a requirement to adjust the summary statistics to be representative of the entire volume being estimated. Cell declustering was applied to the capped composites values of the deposit. Parameters were set to determine the minimum mean weighted assay values of each of the metals over each of the three domains. This was done to help ensure that estimated grades are representative of the entire volume and especially between levels where the clustered data has been collected every 200 feet vertically. The declustered weights of the database assays were applied on a block-by-block basis in the block model.

A total of 8,598 declustered composite samples are contained in the database used to generate the MRE. The MRE in the Technical Report were estimated using an NSR cutoff value of $70/ton and thus excluded estimated regions of the mineral resource domain not meeting those criteria. Assay intervals and composites were flagged for inclusion within the mineral resource domain. Not all assay intervals or composite samples contained within the mineral resource domain were used in the estimation of each block contained within the MRE.

Bunker Hill started a systematic determination of the specific gravity of the mineral types during the 2020 drilling campaign. There has not been enough data collected to determine a variance for the deposit at this time. A tonnage factor of 11.3 Ft^3/t was applied to mineralized material of the Bunker Hill Mine throughout the decades. The same factor has been applied to the MRE.

Two separate block models were created. One for UTZ and one for Quill-Newgard. The models were constructed to best capture the geometries the domains. This helps recognize the shallower dip of UTZ. This is also important for subsequent mine planning exercises. Models were populated with physical and estimation variables. Block tonnages have been by flagging blocks within historic mined-out or development solids. Depletion represents percentages of the block mined, and these values were accounted for in all reporting stated for the MRE.

Search parameters for the estimation ellipses were established using previous geological maps and production data from various levels of the mine associated with the MRE mineralization.

Metal grades for the mineral resource are estimated using inverse distance weighting. Inverse distance methods are a suite of weighted average estimation methods. These result in estimates that are smoothed versions of the original sample data. Inverse distance methods are based on calculating weights for the samples based on the distance from the samples to the centroid of a model block. This is essentially a linear estimate where sample weights are assigned to composite values for all composites used in the estimate. The calculation of the weights is based on the inverse of the distance between the composite and the center of the block being estimated. Sample weights are standardized to a sum of 1 to ensure there is not a globally biased estimate. In the mining industry there are two common exponents used, inverse distance squared ("**ID2**") and inverse distance cubed ("**ID3**"). ID3 is used when large weights are desired for the closest composites. This is applicable when the variable being estimated is erratic and the current data spacing is weighted (declustered) relative to the data that would be available for mineral boundary decision making. Such as with metallic distributions of mineralization. ID3 methodologies are widely used in the mining industry and have proven through the decades to be an acceptable and reliable methodology for the estimation of metal distributions in both large-scale disseminated and tightly concentrated vein type mineral deposits.

Three-pass ID3 estimates were run for each of the composite metal values (Ag, Pb, Zn) with the same parameters for each metal. Capped database values were used for all estimates. Results from visual, nearest-neighbor and statistical analysis showed the ID3 model to well represent actual assay values versus estimated grade over both the QN and UTZ models.

Mineral resources are classified according to CIM Definitions Standards, which are incorporated by reference in NI 43-101. Mineralization at the Bunker Hill Mine has been categorized as inferred mineral resources, indicated mineral resources and measured mineral resources (each as defined in NI 43-101), based upon increasing levels of confidence in various physical characteristics of the deposit. Drill hole spacing, search neighborhoods, metallurgical geological confidence and many other factors were used to give the author confidence in the MRE for the Bunker Hill Mine project. The author is satisfied that the geological modeling for the Bunker Hill Mine honors the geological information and knowledge of the mineral deposit. The location of the samples and the assay data are sufficiently reliable to support resource evaluation.

Classification of mineral resources for the Bunker Hill Mine are based on the distance to the nearest samples used to derive the metal grades for each individual block in the deposit. A minimum of three samples is required for the estimate to be considered a resource of any confidence.

Reasonable prospects of eventual economic extraction assume underground mining, mill processing and flotation. Mineralization at polymetallic mines typically require separate Pb flotation and Zn flotation circuits. Mineral resources are estimated at $70/ton NSR.

Mineral resources are sensitive to the selection of a cut-off NSR. The reported quantities and grades are only presented as a sensitivity of the resource model to the selection of varying NSR values. Mineral resources are not mineral reserves and do not have demonstrated economic viability.

The sensitivity of mineralization defined by the evaluation of the mineral inventory at different metal prices was performed by estimating metal prices at -20% and at metal prices +20%. These quantities are only meant to describe mineralization volumes related to the described metal selling prices. Mineral resources are inclusive of mineral reserves. The reader is cautioned to not add mineral reserves to mineral resources.

Mineral resources are not mineral reserves and do not have demonstrate economic viability. There is no certainty that all or any part of the mineral resources will be converted to mineral reserves.

**Mineral Reserve Estimates**

Mineral reserves have been estimated for the Quill, Newgard and UTZ sections of the Bunker Hill Mine project. Measured mineral resources and indicated mineral resources were converted to probable mineral reserves (as defined in NI 43-101) for the mine. Measured mineral resources were converted to probable mineral reserves because of uncertainties associated with modifying factors that were taken into account in the conversion from mineral resources to mineral reserves. Modifying factors considered were limited metallurgical work, minimal bulk mining / sampling of material in the MRE and current development advancement. All waste and tailings products are assumed to be placed underground in known open voids. There are surface storage contingency plans in the event additional capacity is required. Continued technical evaluations and advancement of mine development are required to estimate proven mineral reserves (as defined in NI 43-101).

The Bunker Hill Mine has been mined continuously since the late 1800's (strikes included) until the early 1980's, with additional limited development, exploration and production up until 1991.

Measured mineral resources and indicated mineral resources were converted to probable mineral reserves by evaluating operating cost, projected metal revenues and estimated stope shapes and geometries. The general widths, plunge and shape of the Quill and Newgard mineralization lends itself well to transverse (perpendicular to strike) long hole open stoping ("**LHOS**") with fill utilizing rubber tire equipment. The UTZ deposit is more amenable to cut-and-fill ("**CF**") methods due to its shape and geometry.

Mineral reserve tonnages are expressed as dry short tons (i.e., no moisture) based on the density values included in the block model database. Maptek's Vulcan Stope Optimization (Optimizer) algorithm was used to developed stope envelopes based on the NSR values of measured mineral resources and indicated mineral resources only. A minimum 5-foot buffer was included around the worked-out stope areas. Delineation drilling is planned prior to mining in support the short-term production mine plan and to identify areas that will require back fill prior to mining adjacent areas.

Extraction of the planned mine shapes is assumed to be 100% of the NSR $80/ton plan. Breakeven NSR is $70/ton for LHOS and $75/ton for cut-and-fill stopes.

Planned dilution is included in the stope shapes at a zero grade. External unplanned dilution has been set at 5% as an average for all primary, secondary and CF stopes with zero grade.

NSR is defined as the proceeds from the sale of mineral products after deducting off-site processing, treatment, shipping and other payable and non-payable costs. This is a common method to evaluate the value of polymetallic deposits.

Two concentrate streams will be produced during the milling process: a zinc concentrate and a lead/silver concentrate. Silver follows lead though flotation and is payable under the lead smelting agreement. Silver reporting to the zinc concentrate is considered non-payable as is zinc reporting to the lead concentrate.

Gold is also present in the lead concentrate, but not payable at this time. The NSR calculation assumes that the zinc concentrate is 58.0% Zn, and the lead concentrate is 67.0% Pb.

The model block size for the Quill and Newgard is 5 ft by 5 ft by 5 ft. Block size for the UTZ is 5 ft by 5 ft by 2.5 ft on the Z-axis. The Selective Mining Unit (SMU) is 10 ft by 10 ft. The Optimizer provides the ability to analyze several cut-off NSR values over a range to projected stope geometry and input criteria. The Optimizer only returns stope shapes that fit the search and input operating criteria, it does not analyze capital development. It is up to the designer to interpret the results and determine the optimum plan. It may return stope shapes that may not be contiguous to the main body. These areas must be further analyzed to determine if including these outliers returns the incremental capital investment. Areas that are too small or remote from the main access development to pay back the development costs have been manually removed from the reserve.

Several alternate stope runs were made at NSR values above and below the nominal $70/ton breakeven cut-off value and various input criteria. Cut & Fill runs at 10 ft by 10 ft heading dimensions yielded a reasonable maximum of greatest metal yield. These were compared to the more operationally economical, but less selective LHOS mining method. LHOS runs were made based on

20 ft wide by 50 ft high stopes. The majority of the optimization runs were oriented transverse to strike which is the preferred orientation. LHOS widths were held at 20 ft primary and secondary stope widths for cost and schedule estimation pending final hydraulic fill strength testing and geotechnical work. Expanding secondary stopes to a 30 ft or 35 ft width remains an up-side opportunity. Cut-and-fill stopes at 10 ft by 10 ft were performed for the UTZ area due to the geometry and nature of the deposit. Cut-and-fill methods represent less than 3% of the reserves. Bunker Hill's management team made the decision to base the mine plan on $80/ton NSR for all mining to maximize positive short term cash flow.

Mineral reserves were classified using the 2014 CIM Definition Standards. The mineral reserve statement is presented in Table 3 below. Mineral reserves are estimated at an NSR value cutoff of $80/short ton at the reference point of saleable mill concentrates with an effective date of August 29, 2022.

**Table 3 - Bunker Hill Mineral Reserve Estimate**
**Effective date of August 29, 2022**

| Area | Description | Tons (x1,000) | Zn (%) | Pb (%) | Ag (opt) | Contained Ag (koz) | Contained Zn (klbs) | Contained Pb (klbs) | NSR (US$/st) |
|---|---|---|---|---|---|---|---|---|---|
| Newgard and Quill | Probable | 3,111 | 5.87% | 2.56% | 1.12 | 3,492 | 365,118 | 159,326 | 133.53 |
| | Plan Dilution | 95 | - | - | - | - | - | - | - |
| | *Unplanned Dilution* | 156 | - | - | - | - | - | - | - |
| UTZ | Probable | 89 | 3.93% | 3.74% | 1.35 | 95 | 7,002 | 6,658 | 122.66 |
| | Plan Dilution | 1 | - | - | - | - | - | - | - |
| | *Unplanned Dilution* | 4 | | | - | - | - | - | - |
| Total | Probable | 3,200 | 5.81% | 2.59% | 1.12 | 3,587 | 372,120 | 165,984 | 133.23 |
| | Plan Dilution | 96 | - | - | - | - | - | - | - |
| | *Unplanned Dilution* | 160 | - | - | - | - | - | - | - |
| | **Total Plan** | ***3,360*** | ***5.30%*** | ***2.40%*** | ***1.02*** | ***3,587*** | ***186,060*** | ***82,992*** | ***126.88*** |

**Mining Operations**

The Bunker Hill Mine was established in 1885. It was operated until 1981 when it was closed due to low metal prices, an extended labor strike and capital short-falls required to meet new environmental standards. Although attempts were made to modernize and operate the mine until 1991, it was finally closed. By this time, Bunker Hill had processed 35.78 million tons of mineralized material with head grades averaging grades of 4.52 opt Ag, 8.76% Pb and 3.67% Zn, containing 161.72 million ounces of Ag, 3.13 million tons of Pb and 1.31 million tons of Zn. Miners had a specific exemption from the draft during World War II due to the vital need for zinc and lead. Mining and development methods evolved over the years and included square-set timber stoping, open stoping via caving methods, overhand cut-and-fill mining with hydraulic fill and room-and-pillar mining with and without hydraulic fill. Long-hole stoping with fill, cut-and-fill and possibly room-and-pillar mining with fill are the only methods economically viable for sustained operations today. Timbered ground support has been replaced with newer ground support technology of rock bolts, mesh, shotcrete and steel sets as required. Room-and-pillar mining is not in the current plan.

A new access ramp is being driven from the 5-level Russell portal (Wardner yard) down to the 6-level which should be completed in October 2022. The existing ramp from 6-level to 8-level will be upgraded for larger traffic and a new ramp from 8-level to 9-level will be driven. 9-level has been and will continue to be the main center of the underground infrastructure. It provides rail access out to the Kellogg portal and main mine yard. A new ramp will be driven from the 9-level down to the 15-level, which is the lowest level in the pre-feasibility plan. Levels below the 9-level are spaced at nominal 200 ft intervals. Sub-level access off the main ramps to the working stopes is provided at nominal 50 ft intervals. These levels will be interconnected with raises to provide ventilation and secondary escape routes.

LHOS is employed with engineered hydraulic fill. This mining method is less selective than CF mining however can be accomplished at a lower cost due to greater labor efficiencies and reduced primary ground support and hydraulic fill requirement. Long-hole panels are established by driving a top cut and bottom cut into the mineralized zone leaving a bench between the upper and lower cuts. This bench is then extracted utilizing the top cut as drilling and loading access and the lower cut for mucking access. LHOS are typically mucked with remote control equipment for safety. Stope centerlines are laid out and designated as alternating primary and secondary excavations. The primary stopes are taken first with native rock on all sides. As they are mined-out, they are filled with an engineered hydraulic backfill. The secondary stopes are then mined out adjacent to the primary backfill. The fill strength requirements for secondary stopes are typically much less as they are the last excavations taken in an area. Secondary stopes are typically filled with development material and low or zero cement content hydraulic fill. LHOS represents over 97% of the reserve tons. Planned dilution is included in the stope shapes and defined as measured and indicated material below the cut-off value. External dilution is included at 5% for all planned tons and set to zero grade.

Overhand cut-and-fill mining is a selective method that can maintain grade and minimize dilution. It has been a staple of underground mining in the Coeur d 'Alene district for years. Rubber tire access ramps have replaced raises, slusher and rail car haulage systems and provide greater production efficiencies.

Overhand mining is a bottom-up method to mine successive stope cuts between main mining levels. Typical cut dimensions are estimated at 10 ft by 10 ft. Ground support is installed as required during each cut. As each cut is completed, it is filled with an engineered hydraulic fill. Then the next stope cut is taken on top of the placed fill and the process repeated until the mining panel between main mine levels is extracted.

The cut and fill stopes are accessed via an inclined ramp developed between levels. The ramp provides ventilation, utilities, and secondary escapeway as well as connecting the mine levels with rubber tire access.

Beginning in October of 2021 and completed in April of 2022, Bunker Hill conducted a geotechnical investigation of the underground conditions at the Bunker Hill Mine. Data collection involved a data analysis of rock-quality designation ("**RQD**") values logged with previous exploration drilling, geotechnical logging of recently drilled rock cores and an extensive investigation of pre-existing underground excavations and development. Ground conditions are generally good to excellent at Bunker Hill Mine and the rest of the mines in the Silver Valley. Bunker Hill Mine does not have a history of rock burst events that are frequent in the deeper mines to the east.

The Bunker Hill Mine is in the Northern Idaho Panhandle region underlain by the Belt-Purcell group of rocks. Mineralization at Bunker Hill is hosted almost exclusively in the upper Revett formation sequence of quartzite dominant rocks. Historically mining followed outcropping veins which did not require extensive geologic interpretation. In the 1970's, after extensive mapping and comparison with drill core, a stratigraphic model was developed, delineating the rocks of the Bunker Hill Mine into three major categories.

- Quartzite ("**Q**"): Fine grained, thick bedded to massive. Mineralization dominantly hosted in this unit.
- Sericitic Quartzite ("**SQ**"): Fine grained, thick to thinly bedded. Interstitial sericitization during metamorphism. Mineralization also hosted in this unit.
- Siltite-Argillite ("**SA**"): Dominantly mud, silt or clay protolith. Thinly bedded, planar. Mineralization is not dominantly hosted in this unit.

The ground conditions at the Bunker Hill Mine are reported to be good to excellent. The Bunker Hill Mine did not have a history of problematic rock burst events as the Silver Valley mines to the east. Bunker Hill is also much shallower than other Silver Valley mines.

A site visit was performed by Golder Associates USA Inc. ("**Golder**") in November of 2021. An underground tour of the mine was conducted to observe the rock mass conditions in the area of previous excavations, future mining areas and develop an understanding of the low RQD values logged in the drill hole database. The tour involved entering through the 5-level Russell Tunnel at Wardner and exiting through the 9-level at the Kellogg Tunnel. Both the UTZ and Quill-Newgard portions at and above the 9-level of the mine were investigated. Some general observations were collected.

- In general, the excavations are stable and mostly unsupported. The quality of the rock mass as observed in the excavations is generally good and there is little variability throughout the mine.
- The RQD values collected during the 2020-2021 drill campaign are consistent with the highly-fractured nature of the core in the boxes, the values are not representative of the favorable stability of the excavations observed during the underground visit.
- The quartzite is a competent bedded rock mass with minor alteration observed as iron staining withing the discontinuities. The water present does not seem to impact the stability of the excavations.
- Rock mass performance seems to be independent of lithology and alteration. However, regional structures do impact the stability of excavations.

Historical caving mining area resulted in large open excavations being created that have maintained a stable profile. The McGatlin cave area is approximately 500' in height between 3 sub-levels (Bunker 4, 5 and 6). It is approximately 150' wide across mineralization strike and varies in length along strike. It is unsupported and unfilled. The hanging wall of the openings was structurally controlled by quartzite beds dipping to the south-west that appeared to have an International Society of Rock Mechanics ("**ISRM**") unconfined compressive strength ("**UCS**") strength estimate of R4, which is classified to be strong. Water was both dripping and flowing from the excavation. No falling or sloughing material was observed at the time. Development in the area was either unsupported or observed to have mechanical anchor bolts with straps in the back.

The “fingers” on the 5-level of the mine are the upper-most proposed area of future mining in the UTZ portion of the MRE. The development ranges from 10’ to 12’ in height and is unsupported. The access ramp to the UTZ fingers was inspected where it crosses the Cate Fault. In this section of drift, the dimensions are 25’ high and 20’ wide with no ground support. The rock mass in the Cate Fault area is quartzite. Discontinuities were observed but no significant dilation or opening along structure greater than 1” were evident. The core holes drilled in this area remain open and in good condition.

Cell mapping was completed in this area to collect rock mass rating ($RMR_{76}$) data in the fingers where recent panel shots had been taken for metallurgical testing. The estimated $RMR_{76}$ of the face mapped is 70%.

The area from the 5-level through the 8-level of the mine is accessible through the Cherry shaft and an internal ramp down from 6-level to the 8-level. The upper area of the Quill-Newgard planned stoping areas can be accessed through this internal ramp system. Level 8 of the mine has numerous openings from pervious mining ranging in dimension from 7’ to 18’ high and 6’ to 15’ wide. Most of the excavations are unsupported. Some of the larger intersections (approximately 25’ spans) have metal straps installed with mechanical point anchored bolts. The rock is bedded quartzite with an iron oxide mineral coating and an ISRM strength estimate of R4 which is classified as being strong. Slight overbreak was observed preferentially along the strike of the bedding planes. A few of the pillars were inspected and indication of stress loading or loss of material from the pillars was observed.

A review of the lithology and dimensions of existing large, stable open excavations at the Bunker Hill Mine was conducted. Analysis included review of large infrastructure excavations, sub-level cave openings and intersections of development drifting.

From this review, and the fact that the large excavations already exist unsupported and are in good condition in a similar geologic setting, it is concluded that the stability of the proposed open stopes of 20’ wide, 15’ to 85’ long and 80’ high is likely to be good.

The core from 17 drill holes was inspected at the core logging facility on site. Most of the core inspected had been split in half for assay. The following observations were made from the split core:

- The core was extremely fractured, much more than would be expected based on underground conditions at the mine.
- The condition of the core observed in the core logging facility and the logged RQD values are not considered representative of the generally favorable stability of the excavations observed underground. The rock mass contains micro-weaknesses that result in fracturing of the core when drilled, but these weaknesses do not adversely impact the stability of the excavations observed underground. Splitting of the core likely resulted in additional fracturing of the core.
- Rock mass characterization (NGI-Q or $RMR_{76}$) estimated from core logging grossly underestimates the quality of the rock mass. The rock mass does not appear to be well characterized by common rock mass characterization systems (RMR and Q).
- Very few sections of moderate to high alteration were identified in the core in the area of the proposed mining indicating that alteration would not have a significant impact in assessing the stability of excavations.

ISRM strength estimates were recorded for a total of 1779’ of drill core. A total of 96% of the logged information indicated that the ISRM strength was R4 (50 to 100 Mpa, R4) which is classified as Strong rock.

Core samples were collected and sent to Golder’s rock laboratory testing facility in Burnaby, BC Canada for UCS testing. The manner in which each sample failed was recorded as follows:

- Discrete: Shear failure along one discrete feature (weakness)
- Homogeneous: Failure through homogenous rock matrix by extension
- Failure Network: Failure completely along multiple veins, or around clasts, etc
- Combined: Failure by a combination of shear failure on discrete features and extension or shear failure through the homogenous rock matrix

The results correlate with the ISRM strength estimates collected during the site visit, both indicating generally Very Strong Rock (R5) for homogenous failures and Strong Rock (R4) for other failure types.

A review of the layout of the development drifts relative to the historical production mining in the UTZ Fingers areas from 8-level up to 5-level was carried out to assess stand-off distances at which there is a low probability of adverse interactions between development and stoping. The historical stand-off distance at the location checked on 8-level was as narrow as 10 ft at some locations but was between 18 ft to 20 ft at higher levels up to 5-level. Golder recommend at least 25 ft of offset distance be maintained for stope access drifts.

Most of the existing excavations underground were unsupported and the stability generally appeared to be good. Mining personnel working in unsupported excavations is a safety concern and ground support is recommended for new excavations. Further rock mass characterization and testing is required to refine the recommendations on adequate ground support requirements for the various development dimensions of future mining activities underground. Bunker Hill plans to use friction anchor rock bolts and a combination of steel mats and chain-link wire to support ground in development drifts with a dimension up to 15' wide x 15' high. This is in combination with the use of 8'-long #7 resin grouted rebar with plates and nuts in the back of the drifts. Additional resin grouted rebar ground support will be utilized in intersections where span distances exceed 15'.

Production development should take into consideration the potential impacts of the stress redistributions as mining progresses. Bunker Hill will monitor ground support conditions as mining and development progress deeper in the mine and adjust ground support implementation as required. Development directly adjacent to or driven through structural zones of poor ground conditions will require additional ground support investigations and alterations to the ground support plan associated with development not located in structural zones.

LHOS and CF mining methods require backfill upon completion of the stope mining cycle. Planned dimensions of the LHOS are 20 ft wide, 50 ft high and range from 15 ft to over 85 ft long as a single panel. The strength requirement evaluation for paste backfill is based on the free-standing capacity of fill required when a secondary stope is mined and exposes a side wall of the fill mass. Based on the planned stope dimensions in the mine plan, the design UCS is 250 kPa (36.3 pounds per square inch ( "**psi**")) for an exposed height of 25m (80'), a length of 8m (25'), a density of 21 kilonewtons per cubic meter ($kN/m^3$) and a factor of safety (FOS) of 1.5.

The above geotechnical assessment by Golder should be expanded once additional core drilling has begun. Conservative ground support installation patterns, pillar widths (ramp setbacks), and stope dimensions have been used in the mine plan and cost model based on the authors experience. There are definite cost advantages to increasing stope dimensions (e.g., 30 ft secondary stope widths).

Core should be logged at the drill by an experienced geotechnical geologist or engineer. Additional down hole televiewer surveys and logging are also recommended.

A conceptual model should be constructed and include domains delineated according to:

- Geomechanical characterization of domains (Q', $RMR_{89}$, RQD, rock strength, weathering, joint set orientations and joint character).
- Definition of engineering properties of the rock (intact and rock mass as well as joint characteristics and joint strengths).
- Spatial distribution of geomechanical design domains (i.e., domaining by rock type, structural zones or spatial volumes).

The mine should develop and maintain Mathews-Potvin Stability graphs based on this work and modify as required with operating experience.

In Q4 of 2021 Bunker Hill engaged Patterson & Cooke USA Ltd. ("**P&C**") to conduct testing on both tails thickening and a hydraulic (paste) backfill system to meet the identified geotechnical strength requirements. For the testing, approximately 50 gallons of tailings material produced from the metallurgical test program identified in section 13 of this report was sent to a P&C testing facility, along with approximately 20 gallons of process water.

The first stage in the backfill process will involve the thickening of tailings produced from the mill/process facility located within the mill/process facility building. Initial testing found the tails product to consist of 58.8%m (by mass) solids (density of 2,699 +/-16 $kg/m^3$), the zero free-water testing showed 75%m solids. Both of these figures result from a 16%m pull concentrate load, the remaining being tails product. Tails product included material from both the Pb and Zn circuits of the processing plant. With continued optimization and variability testing of the process workflow this mass pull % will be adjusted accordingly in future plant engineering but is not projected to materially change.

Additional test work was completed on the tailings products including pH, mineralogy and conductivity. The process water was then characterized, and the zero free water material tested for cake resistance, zeta potential and particle settling behavior. Dynamic high-rate thickener tests and dynamic batch thickener bed consolidation tests were conducted for the tails thickening test work. Further rheological testing was conducted on the thickened tails products and carrier fluid to identify the transportable and flow moisture points.

In order to generate a bindable product, filtration tests were run on the thickened tailings material for both a vacuum and pressure filtration circuit. Summary of the results determined that optimum flow moisture point was achievable at all chamber widths tested in both scenarios. For operational implementation, Bunker Hill will use vacuum filtration for the UG paste distribution plant. Further dewatering of thickened tails product, if needed to produce a typical dry stack product, could be achieved with the use of pressure filtration.

To investigate the binder requirements and properties of binder-added, filtered thickened tailings material, a 5% binder (cement) added product was created for testing with a viscometer and a slump cylinder to generate curves for Boger yield stress vs. cemented paste mass concentration.

UCS testing was required to match against geotechnical recommendations and test the adequacy of the paste product. Binder was added using a ribbon mixer at various concentrations. Binder used was Ashgrove Portland Cement Type I/II. Additional tests were carried out using a 4.8% cement addition to a filtered, thickened tailings product pre-mixed with 0.9% mass component of a high-density sludge ("**HDS**") product collected from the Treatment Plant for future potential inclusion in the paste backfill as a sequestration method. Although current mine plans do not envision Bunker Hill operating its own water treatment plant for mine effluent, and therefore not producing a HDS material requiring sequestration, Bunker Hill has access to HDS material from the Treatment Plant if it is found to be beneficial as an additive to stope backfill.

Geotechnical recommendations from Golder on UCS strength for the proposed stoping dimensions was 250 kPa. All binder concentrations tested met the recommended strength requirements by the 7-day cure timeline. This allows for future optimization and cost reduction with the use of lower binder concentrations and continued HDS addition. Stope sequencing will allow for cure times of greater than 28 days, further allowing for test work investigating reduction in binder addition concentrations. Results from this test work went into the development of GA and equipment specifications regarding the proposed underground backfill system at the Bunker Hill Mine.

At the completion of both long hole stoping and cut and fill stoping there will be a need for a backfill component to allow for the adjacent stopes to be mined. This will be accomplished using an engineered hydraulic (paste) backfill system to pump binder-added, thickened tailings back into the mined-out stope voids. The tailings from the process plant will be sent to a tailings thickener located in the mill/process building. Thickened tailings will be pumped to an adjacent building where a vacuum filter cake will be produced. This filter cake will the back hauled to the Wardner portal site via the same off-road haul trucks bring ore down to the mill. The filter cake will be mixed with the required binder components at Wardner and pumped underground. Surge piles of filter cake at the mill and Wardner site allow for operational flexibility for both the mine and mill.

Paste plant operational costs have been estimated on an annual basis for a 1,500 tpd production rate. With the increase to 1,800 tpd production rate, additional OPEX detail is planned with continued detail plant engineering but is not projected to show material changes. Continued test work will focus on optimization of binder additions and flocculant requirements to reduce consumption rates to match geotechnical requirements.

The Wardner backfill plant will produce engineered geotechnical hydraulic fill for the mining operations and a pumpable tailing product to be placed in existing open stopes and select secondary stopes. Mix design and binder content vary depending on use requirements. Delineation drilling in advance of mining will be used to confirm final stope geometries and identify historically non-filled stopes which will be appropriately backfilled prior to new mining advancements.

Contract mining is envisioned with the current contractor, Coeur d 'Alene Mine Contracting, LLC ("**CMC**") supplying mine supervision, labor and explosives. Bunker Hill will provide materials, supplies, engineering, geology and overall site management. Mining equipment has either been purchased or will be purchased by Bunker Hill.

Production is scheduled to begin in the 4$^{th}$ quarter of 2023 and ramp up to 1,800 tpd over the two quarters following commencement of production. Initial production will be target above the 9-level as the lower levels are developed. The mine plan is developed to allow sequential water draw-down as new production horizons are required. This sequencing is continued to the 15-level which is the lowest level in the pre-feasibility plan.

Ground conditions are generally good to excellent at the Bunker Hill Mine. Typical access ramp and development headings are designed at a nominal 12 ft H by 12 ft W cross section. This is a minimum so with overbreak slightly greater. CF headings are costed at 10 ft H by 10 ft W. LHOS sill dimensions are 15 ft H and 20 ft W with a bench depth of 35 ft for both primary and secondary stopes.

An average cost of $15.59 / ft was used for matts and wire in the development headings and LHOS sill cuts. Additional resin rebar bolting is expected in intersections.

Bunker Hill will maintain a mine geology program to collect and analyze data from both development and production headings to maintain and provide quality assurance / quality control data for mine to model and mine to mill reconciliations. Mine geologists will be responsible for the visitation of active mining areas to collect rock sample and mapping data. For long hole stope areas, the top and bottom cuts will provide direct access to the mineralized material for collection by channel sampling. Detailed drift mapping will add to the already extensive geologic digitization of historic geologic maps. With the current mine design, there is also the opportunity for the use of core drilling to assist in the delineation and sampling of portions of the mineralized body ahead of the driving of the top and bottom stope cuts. Allowance for grade control geologic activities is accounted for in the cost build-up for stoping activities. Due to the nature of the bluebird style mineralization to be encountered in the UTZ, Quill and Newgard sections of the MRE, strict geologic control will not be the main focus of underground geologic

methods, but rather to allow for the continued refinement of grade control and resource models, in addition to providing top-line numbers to assist in full run of mine ("ROM") reconciliation programs.

The mine ventilation requirements were modeled using VNET (Mine Ventilation Services software now part of SRK Consulting). The extents of the underground workings are immense. Access is limited to several workings in the mine and air flows have been measured flowing into areas which are currently inaccessible. The mine has substantial natural ventilation flows most of the year. It has been naturally ventilated prior to the fan installations this year to support the drive from the 5 to 6-level. A combination of the 1981 ventilation paper maps, digitized level maps, lidar level and raise surveys, input from Bunker Hill safety and survey personnel, in addition to CMC personnel was used to construct the model. Air flow quantity measurements have been routinely recorded during the start-up; however, a differential pressure survey has not been performed. The airway resistance k-factors used are empirically derived from other similar airways aggregated from a number of mines and published by other sources. Once the 5 to 6-level ramp is completed, and the first main mine fan is installed, a field vent survey can be conducted and k-factors adjusted as required. Additional ventilation work is required and will be part of Bunker Hills ongoing engineering duties.

The main airways for the mine levels above the 9-level are the 5-level from the Russell portal and Hanna stope area to the top of the Newgard ramp, the Newgard ramp, the Cherry Raise which connects 9-level to the surface above and to the east of the Russell portal above Wardner, the S. Chance raise which connects the 7, 8 and 9-levels and the KT which daylights at the Kellogg portal. Temporary fans as of September 2022 are installed to draw air in from the Cherry raise and out the Russell Portal and Hanna stope area. Booster fans and fan lines support the Newgard ramp drive to the 6-level. The first main mine fan will be installed with an airlock in the Newgard ramp just above where it is planned to intersect the 6-level. This fan will be a Spendrup 84" 400 hp which is in the process of being purchased along with other fans and equipment from Teck's Pend Oreille mine which is being closed. This fan will initially operate at about 180 kcfm and 5" water gage (w.g.) drawing air down from the 5-level Russell Portal/Hanna area ramp and forcing it out the Cherry raise and KT to the Kellogg portal. The fan location in the Newgard ramp just above the 6-level will minimize recirculation on the intake side. Bulkheads and other stopping will be installed as required on the levels to prevent short circuiting of air prematurely up the Cherry raise. Booster fans and vent lines will support the Newgard drive from the 8-level to the 9-level. Air will flow down the S. Chance raise and current manway to the 9-level providing a fresh air base at the top of the 8 to 9-level Newgard ramp as it is being driven.

The Newgard ramp will continue to be driven from the 9-level down to the 15-level to serve as primary access to these levels. A new raise is required to move air from the 8-level to the top of this new ramp (8.5 to 9.5 Newgard raise). An airlock at the top of the 9 to 10-level ramp will allow the fan placed at the bottom of this new raise to force air down the ramp. A portion of the 9-level from the base of the Cherry raise will be upgraded and another new ramp and fan drift will be driven to intersect the 9 to 10-level Newgard ramp. These two fans will support mining at the lower levels with air down the Newgard and return air coming across the existing levels, up the existing #1, #2 and #3 shafts; and the new level raises and manways which will interconnect the 50 ft stope levels between the main mine levels (~200 ft). An additional exhaust airway will be established on the 8-level above the #1 and #2 shaft area to exhaust out through a combination of upgraded levels and new development raises and ramps to Wardner. Once the 9 to 10-level ramp is driven and flowthrough is obtained, the Cherry raise fan can be started which will now draw air down the Cherry raise. Intake airways will be the Cherry raise and the Newgard ramp via the new 8 to 10-level ramp raise. Exhaust will continue out the KT and out the new exhaust established from 8-level to Wardner. Two additional fans will be required at the bottom of the S. Chance raise and 9-level access to the #3 shaft. Both of these fans are small and considered fan splits in lieu of bulkheads to prevent dead air and possible recirculation.

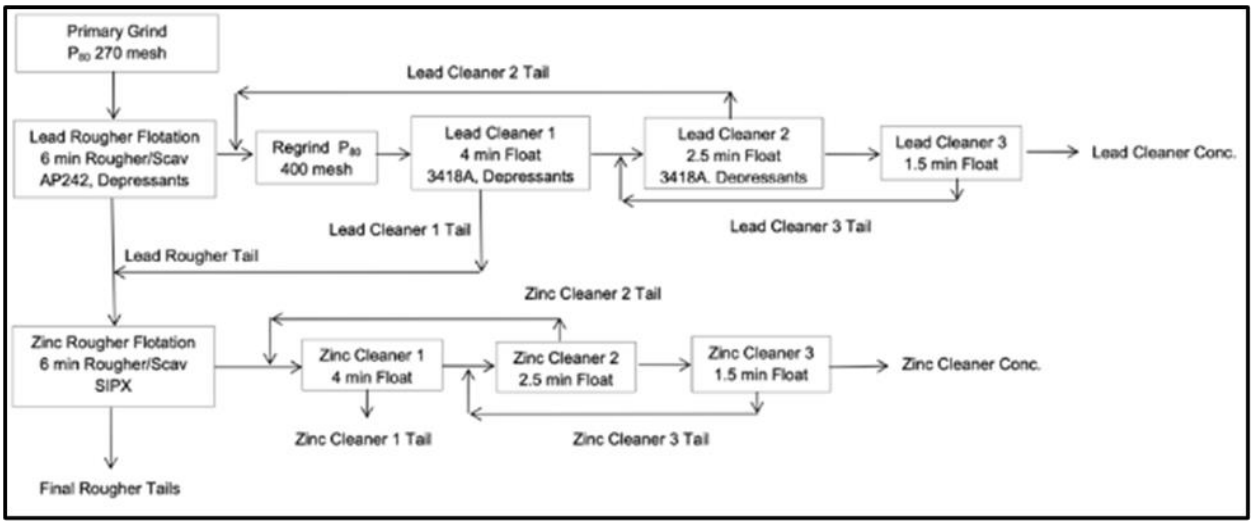
The ventilation plan assumes there will be communication with the old workings and the shafts once they are dewatered. This is likely, considering the condition of the rest of the mine.

The mine is currently flooded to just above the 11-level. Pumps are located in the #2 shaft compartment to maintain this level. Level collection will be established, and pumping will continue and underground wells or upper-level clean water inflow sumps will be installed to provide a source of mine process and drill water. Mine and process water will also be available via multiple historic drill holes that have intercepted fresh water and have been grouted and headered into supply lines. The development cost estimate includes installation of mine water, discharge water, communications, electric and air lines to and from the working headings.

**Processing and Recovery Operations**

The conceptual process flowsheet and the process design criteria were developed based on the completed locked-cycle test work done by RDi and the historical plant description discussed above.

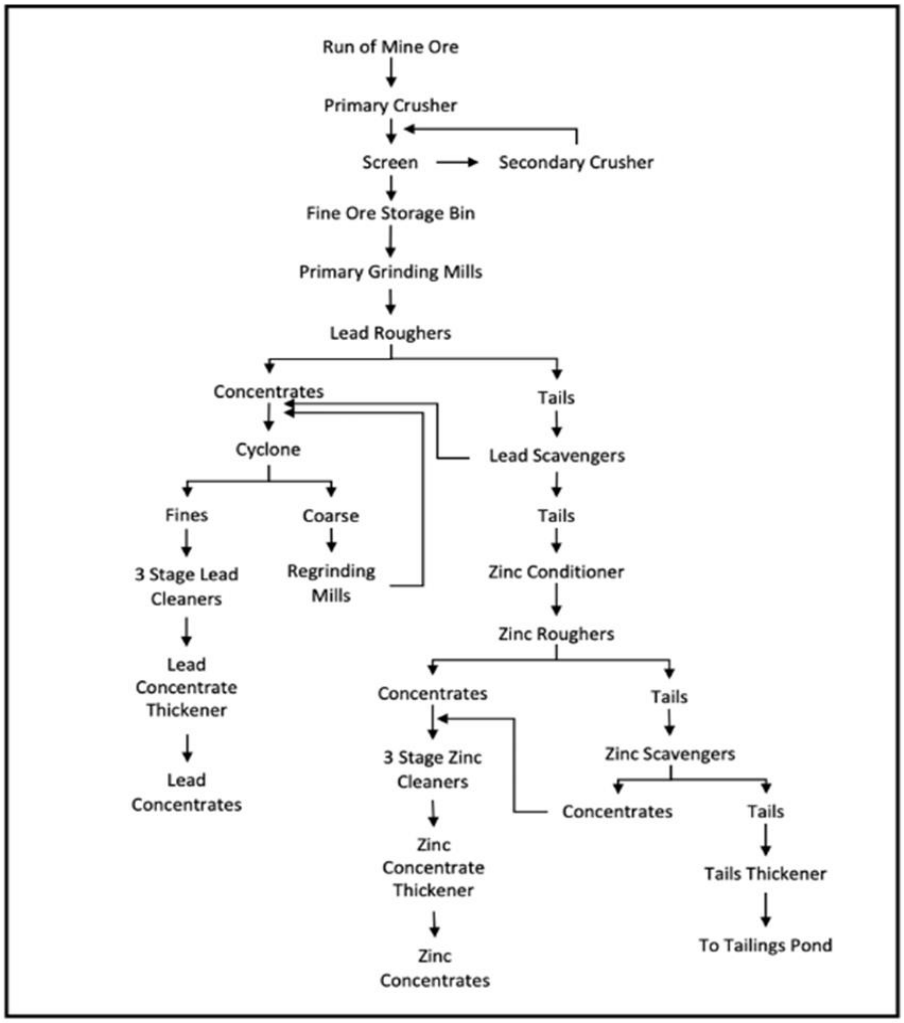
**Figure 2 – Locked-Cycle Test Process Flowsheet**




Bunker Hill plans to re-construct a crush-grind-flotation-concentration mill from the nearby Pend Oreille mine in northern Washington on the Bunker Hill Kellogg Mine Yard. There currently is a large building that housed the historic machine shop at the Bunker Hill Mine that will first need to be dismantled and removed for access to the existing slab. The future structures to house the grind-flotation-concentration circuit, as well as the secondary crushing circuit and concentrate storage facilities will need to be constructed.

The process consists of a primary and secondary ore crushing circuit, then a primary grinding circuit followed by two separate flotation circuits to recover lead, zinc, silver and gold into two separate concentrate products; a lead, silver, gold concentrate and a zinc concentrate. Approximately 648,000, short tons of ore will be processed a year at a rate of 1,800 short tons per day ("**stpd**"), or 79 short tons per hour at 95% availability.

**Figure 3 – Bunker Hill Process Flowsheet**




The flotation tailings are thickened and backfilling underground under the current startup plan. Later, tailings will be sent to a paste backfill processing facility underground and the remaining thickened tailings to the dry-stack tailings facility for storage. Overflow streams from the tailings thickeners reports to the main process water collection tank, where it is treated and recycled for re-use in the plant according to process needs.

An operational and metallurgical review of process plant operations in recent months and metallurgical test programs have resulted in the identification of substantial improvements to the current process flowsheet and equipment to increase operating availability and product quality while maximizing production.

Process improvements currently planned for the Bunker Hill plant are based on operating experience by mill staff, technical reviews by consultants, and on metallurgical test results provided in and the interpretations derived from the recent test programs.

The plant is designed to process 1,800 stpd with an overall availability of 95%.

**Infrastructure, Permitting and Compliance Activities**

The Bunker Hill Mine complex is a mature mine with much of the underground infrastructure and development still in place. The mill, smelter and tailing impoundment have been removed and these sites have been reclaimed. Part of the reclamation included surface water diversion structures which are still in use and are maintained in good condition. The original Bunker Hill Mine offices, car and maintenance shops, and change house are located near the Kellogg Tunnel ("**KT**") portal and are in serviceable condition.

Road access to the property and the various mine access portal locations are good to excellent. The KT portal is located immediately adjacent to the mine offices at the 2,380 ft elevation. The KT is currently rail haulage and connects to the main hoist rooms and inclined shafts approximately 9,500 ft laterally to the south-southwest on the 9-level at the 2,415 ft elevation. Levels

8 through 4 are above the 9-Level on approximately 175 ft intervals. Levels 10 to 28 are below the 9-Level at approximately 200 ft intervals. Additional mine portals provide access to the 5-level on the Wardner side of the mine. There is a tremendous complex of underground shafts, raises and other infrastructure at the Bunker Hill Mine. Only infrastructure germane to restarting mining operations are addressed in this Prospectus. Avista Utilities ("**Avista**") supplies electrical power to the mine from a sub-station located near the Kellogg side office complex. The Kellogg offices have a high-speed internet connection.

The Bunker Hill Mine is located in Kellogg Idaho along the Interstate 90 corridor on the west side of what is traditionally known as the Silver Valley. It is 60 miles from the Spokane, WA airport to the west and 125 miles to the Missoula, MT airport to the east. The Silver Valley of north Idaho is a desirable place to live and is home to an enthusiastic and talented underground mining work force.

The Avista Kellogg substation is located next to the Bunker Hill Mine main offices and supplies power to the mine and other local consumers.

There are two existing distribution lines now supplying the mine from the Kellogg Avista substation. One feeds the surface mine facilities and the underground loads from the Kellogg side, the other feeds the Wardner mine yard and facilities. The current 3-phase 2.5kV mine distribution system on the Kellogg side is in the process of being upgraded to 3-phase 13.2kV. The overhead powerlines leading to the Wardner side of the mine will be completely upgraded with 3-phase 13.2kV by October 2022. New underground power feeds will be brought in on the Wardner side on 5-level and dropped down to the 9-level for distribution to the mine. A new power feed was installed in the KT to the 9-level underground distribution and currently feeds the underground at 2.5kV. This is a 25kV rated cable and will be upgraded to 13.2kV to minimize line voltage loss. The 9-level around the #1 and #2 hoist rooms will remain the hub of underground infrastructure. The existing u/g substations and switchgear will be replaced with modern equipment. Bunker Hill has been working closely with Avista to upgrade the electrical supply infrastructure to both the main the Bunker Hill Mine yard (9-level) and Wardner (5-level) sites. Additional capacity will be freed up at the main Kellogg/Bunker Hill Mine substation by redirecting other non-mine loads to adjacent Avista substations where feasible (either immediately or with minimal additional infrastructure). Capital costs for these activities are funded by the project up front and then credited back to the operational power bill over the life of the project.

Mine discharge water now gravity drains out the 9-level through the KT via a ditch adjacent to the rail line to the portal. It is then routed to a water treatment plant constructed by the EPA and currently operated by the Idaho Department of Environmental Quality ("**IDEQ**"). Water above the 9-level naturally drains out of the KT and averages 500 gallons per minute ("gpm"). Below the 9-level water must be pumped to dewater the workings. Maintaining a water level below the 9-level requires about 700 gpm (1,200 gpm total) to be pumped out of the mine. An additional pumping capacity of 600 gpm was assumed to draw the water table down to successive levels in the mine based on operational experience. It is envisioned to handle the water above and below the 9-level in separate pipeline systems out the KT. Water below the 9-level will be staged up through a series of pump stations located on each level. Mine discharge will continue to be treated at the IDEQ facility under a continued use agreement, all costs of which are included in reported operating costs.

Mine and process water distribution will be developed from underground water sources with either clean water collection sumps or underground interception wells. There is currently not a mine wide water distribution system, but systems for process and dewatering are included in the capital estimates. CAPEX has been budgeted for utilization of underground water sources to be used for mining activities and the mill/process facility will have its own process and make-up water system budgeted for.

Bunker Hill commissioned Patterson & Cooke North America to perform tradeoff studies for costing and operating the mine backfill and tailing placement facilities. The main factors investigated for capital expenditures were pumping requirements based on the material being transported vs friction loss on the pipe run-lengths, ease of binder transport to location, cost to construct (excavate) and future efficiency to distribute to mining areas.

The logistics of operating the milling and processing operations with the hydraulic backfill plant were also considered. The backfill plant will produce two basic products; high strength modulus product for engineered fill back into stope voids and, a low strength modulus product to dispose of excess tailing materials into historic mine openings or when possible secondary stope voids. Pumping the thickened tails underground directly from the mill thickener to vacuum filtering, binder addition and fill placement is viewed to have logistical issues. Filter cake storage is limited underground which requires the mine to placing fill constantly while the mill is running. Conversely, when the mill is not running the mine will not have a fill product.

Capital estimates were developed for the four basic components of the system:

1. tailing thickening;
2. thicken tailing pumping;
3. thicken tailing vacuum filtering (filter cake); and
4. binder addition and pumping fill into the mine.

The tradeoff studies investigated options for locating the four components of the plant:

- All components on surface directly adjacent to the mill tailing thickener.
- Tailings thickening at the mill with thickened tails being pumped underground to the 5-level of the mine where vacuum filtering, binder addition and pump distribution down into the mine voids.
- Tailings thickening at the mill with thickened tails being pumped underground to the 9-level existing excavation known as the Scotty Shop, where vacuum filtering, binder addition and pump distribution up and down into the mine voids.
- Tailings thickening and vacuum filtering at the mill with filter cake being backhauled in the offroad ore haul trucks to the 5-level Wardner (Russell) mine yard where binder addition and pump distribution down into the mine voids will take place.

Results from the tradeoff studies led to the location of the plant on surface, both adjacent to the mill and at Wardner. Tailings thickening will take place inside the mill/process facility building, with the underflow being pumped to the tailings filtration plant located adjacent to the mill/process building. Vacuum filtration will take the thickened tailings and produce a filter cake material which will be deposited and stored in a load-out facility at the plant. A surface loader will transfer the filter cake tailings into overland haul trucks to deliver the material up to the Wardner side of operations along the return route from ROM ore haulage. This saves the requirement to construct a thickened tailings pumping system to deliver feed to the paste plant from the tailings thickener and incurs a lower operational cost to utilize the return trip of the haul trucks to Wardner.

Once delivered to the storage facility at Wardner, material will be loaded into the paste plant, combined with an ordinary cement binder, and subsequently pumped underground via a reticulated piping system. Location at Wardner on the 5-level of the mine will work to greatly reduce the pump horsepower requirements as a majority of the stoping will occur below this elevation. Reticulation piping will work to both deliver backfill material to stoping areas as sequence backfill and to historically mined out void space for storage of additional tailings material. A detailed equipment capital list has been compiled for the 3 components of the plant (tailings thickening, paste plant and reticulation system). Continued detailed engineering is underway for the arrangements and construction of both the Kellogg and Wardner facilities. An operational cost associated with the paste backfill has been assigned to the overall mining cost buildup.

Environmental contamination of surface water, groundwater, soil, and sediment occurred at the site as a result of mining, milling and smelting operations in the Silver Valley, including but not limited to, at the Bunker Hill Mining and Metallurgical Complex ("**Complex**"), of which the Bunker Hill Mine was a part. Operations at the Complex started in 1885 and continued through the 1980s, and included an integrated system of mining, milling and smelting. Prior to 1928, liquid and solid waste from the Complex was discharged directly into the South Fork of the Coeur d'Alene River and its tributaries. Following 1928, waste from the Complex was directed to a nearby floodplain where a Central Impoundment Area ("**CIA**") was developed. Acid mine drainage ("**AMD**") and wastewater from the Complex were discharged to a settling pond in the CIA. In 1974, the Treatment Plant was built by the Bunker Hill Mining Company, the owner and operator of the Complex at the time. AMD and wastewater from the Complex were stored in an unlined pond in the CIA before being decanted to the Treatment Plant. In 1981, following the closure of the smelter, the CIA was no longer required to impound wastewater from the Complex, although surface run off from the Complex and AMD from the Bunker Hill Mine were still routed to the CIA prior to treatment at the Treatment Plant. Sludge which formed during the treatment process was also disposed in unlined ponds at the CIA.

Ownership of the Bunker Hill Mine complex passed through a number of companies throughout the 100-year operation of the Bunker Hill Mine complex. In early 1991, the Bunker Limited Partnership, then owner of the Bunker Hill Mine complex and operator of the Treatment Plant, closed the Bunker Hill Mine and filed for bankruptcy. In late 1991 and 1992, Placer Mining purchased a portion of the site, which includes underground workings, mineral rights, and much of the land surface above the Bunker Hill Mine, from Bunker Limited Partnership. Placer Mining did not purchase the entire Complex nor the Treatment Plant. In November 1994; federal and State governments assumed operation of the Treatment Plant for ongoing treatment of AMD.

AMD is a result of acid-forming reactions occurring within the Bunker Hill Mine among water, oxygen, sulfide minerals (especially pyrite) and bacteria. AMD is acidic with typical pH levels between 2.5 and 3.5, and it contains high levels of dissolved and suspended heavy metals. For human receptors, the constituents of primary concern at the site found in the AMD are arsenic, cadmium, lead, mercury, and thallium, and for aquatic and terrestrial receptors they are aluminum, arsenic, cadmium, copper, iron, lead, manganese, mercury, selenium, silver, and zinc. Impacts on human health from exposure to these constituents include carcinogenic effects, skin lesions, neuropathy, gastrointestinal irritation, kidney damage, interference with metabolism, and interference with the normal functioning of the central nervous system. Impacts on the environment from exposure to these constituents include significant mortality offish and invertebrate species, elevated concentrations of metals in the tissues of fish, invertebrates, and plants, and reduced growth and reproduction of aquatic life.

AMD is generated and discharged from the Bunker Hill Mine continuously. AMD from the Bunker Hill Mine is drained through the Kellogg Tunnel portal and then passes through a conveyance system to the Treatment Plant for treatment. Average AMD

discharge from the Bunker Hill Mine during typical flow periods is approximately 1300 gallons per minute. During high flow periods AMD may be diverted to a lined surface impoundment on the site, where it mixes with other minimal wastewater streams from the Bunker Hill Mine. From the impoundment, it is pumped to the Treatment Plant for treatment. If not collected and treated at the Treatment Plant, AMD from the Bunker Hill Mine would flow downhill through the mine yard, across properties where public and environmental exposures would occur, and into Bunker Creek and the South Fork Coeur d'Alene River where it would have significant detrimental effects on water quality and the ecosystem.

Initially, the Bunker Hill Superfund Site was divided into two operable units, the Populated Areas and the Non-Populated Areas, in order to focus investigation and cleanup efforts. A Record of Decision ("**ROD**") for the Non-Populated Areas Operable Unit was signed on September 22,1992. A ROD Amendment for the Non-Populated Areas Operable Unit, addressing the management of AMD was issued in December 2001. A third operable unit was created to address contamination in the Coeur d'Alene Basin, and a ROD for Operable Unit 3, the Coeur d'Alene Basin, was issued in 2002.

In 1994, EPA issued a unilateral administrative order("**UAO**") to Placer Mining directing Placer Mining to keep the mine pool pumped to an elevation below the level of the South Fork Coeur d'Alene River (at or below Level 11 of the Mine) to prevent discharges to the river, to convey mine water to the Treatment Plant for treatment unless an alternative form of treatment was approved, and to provide for emergency mine water storage within the Bunker Hill Mine. In 2017, EPA issued a UAO to Placer Mining directing Placer Mining to control mine water flows to the Treatment Plant during needed upgrades at the Treatment Plant and in high flow periods, to conduct operation and maintenance of the Reed Landing Flood Control Project, to file an environmental covenant on a portion of the Bunker Hill Mine property regarding access and operation and maintenance and allowing Placer Mining to fill the mine pool to Level 10 during diversion events.

Response actions required by the 1994 and 2017 UAOs are currently being performed by Bunker Hill. Upon the later of the effective date of the Settlement Agreement, EPA withdrew the 1994 and 2017 UAOs. To the extent that aspects of those UAOs required ongoing work, Bunker Hill agreed to perform such work when it became the operator of the Bunker Hill Mine and is now continuing to perform that work now that Bunker Hill is the owner of the Bunker Hill Mine.

Bunker Hill began a study of the Bunker Hill Mine water system in March of 2020. The review included studies conducted by the EPA and research conducted by the Bunker Hill Water Management team. This led to a formulation of the following near-term water management activities:

- Acid Mine Drainage Collection System – this captures and controls flows of AMD to keep them separate from cleaner water in the mine. Total collected AMD flows from levels 5 through 9 fluctuate between 6 gpm and 30 gpm depending on the season that contains approximately 70% of the metal load in the effluent of the Bunker Hill Mine. This system was designed and implemented in 2020 and is still in use as of the effective date of the Technical Report.
- Surface Water Infiltration Study – Bunker Hill has entered into a Sponsored Research Agreement with University of Idaho to conduct a study of infiltration of surface waters into Bunker Hill Mine. The study will be conducted by a Water Resources graduate student with support from the Hydrology and Hydrogeology faculties. This will inform future source control projects that will seek to limit water infiltration.
- Source Control Program –This will reduce the amount of surface waters entering the mine, which is ultimately expected to reduce water treatment costs by reducing the amount of water requiring treatment. The initial project is a series of test plots of trees, shrubs and grasses to determine which mix of plants will most effectively revegetate the surface expression of the Guy Cave with a dense and broad root network. This project is being carried out in collaboration with the University of Idaho. This area is a barren hillside that is a major point of water infiltration. Within the mine, the Guy Cave is rich in pyrite, which produces AMD when mixed with air and water. Reducing the amount of water infiltration into this area will significantly reduce the amount of AMD produced within the mine. The second area of collaboration with the University of Idaho that aims to reduce water in-flow through the surface expression of the Guy Cave is an engineering project that will evaluate the effectiveness and cost of different approaches to establishing a cap or a barrier to flow. This has been designed as a 3-year initiative.
- Water Sampling and Testing – Water samples are collected on monthly basis for wide spectrum testing that includes 45 different analytes at 30 different locations in and around the Bunker Hill Mine. Once a sufficient amount data has been collected, these results will allow Bunker Hill to apply for an IPDES water discharge permit in the future. Field parameters are measured on a biweekly basis by the Bunker Hill Water Management team using a collection of instruments. The parameters include conductivity, pH, dissolved oxygen, total dissolved solids, water temperature, ambient temperature, ambient humidity and flow rate. The sum total of this information provides insights into the efficacy and impacts of water management program activities and deepen understanding of the Bunker Hill Mine water system. Much of this information is available to the public in the "Interactive Database" section of the Bunker Hill website. Bunker Hill is collaborating with the University of Idaho in a multi-year study of the water system as well. This study focuses on the presence of specific isotopes within water molecules that create a unique signature that all the

research team to determine the pathways and rate of flow of water from snowpack on the mountains above the mine on their journey into and out of the mine. This will ultimately inform water modeling and lead to more efficient water management practices.

Many of these activities will continue and extend far into the future. The duration and intensity of these activities will depend primarily on two factors: (1) development of understanding through continuous improvement of a conceptual site model and (2) the magnitude of impacts generated by the activities as measured and recorded by Bunker Hill performance monitoring.

Over the summer of 2022, Bunker Hill conducted a pilot scale water treatment study ("**WTP**"), under the direction and design completed by Mine Water LLC. The plant was housed in the existing surface infrastructure outside the Kellogg Tunnel portal. The goal of the plant was to understand the mine site's water treatment requirements. The pilot system was capable to treating 50 – 120 gpm of mine effluent water. It made use of a Lamella clarifier in conjunction with lime slurry addition and multiple stages of flocculation and agitation to treat the water currently discharging from the Kellogg Tunnel. That effluent is currently piped to the Treatment Plant. Products from the plant are a stream of cleaned water meeting all requisite discharge standards and a HDS material that was scheduled to be included into the paste-backfill tailings stream to be included in stope backfill.

Testing commenced in May 2022 and finished in July 2022. A total of 16 tests were scheduled, of which 10 were completed covering various parameters of pH, flow and flocculant dosages. The pilot WTP program and design proves that Bunker Hill could construct a WTP capable of meeting its discharge standards for full mine effluent. As of the effective date of this report, all testing using the pilot WTP has concluded, and results verified by Mine Water LLC. The plant itself is currently being disassembled at the Bunker Hill Mine site.

Discussions are ongoing with IDEQ and EPA about the proposed use of the Treatment Plant adjacent to the mine. These discussions have allowed Bunker Hill to project the continued use of the Treatment Plant through the remainder of mine life outlined in this Technical Report and subsequently not requiring the need to construct an internally operated water treatment plant. This allows for the capital expenditure savings of not having to construct an internal WTP, and the operational expense of additional staffing and reagent consumption. All costs associated with continued use of the Treatment Plant are scheduled into mine operational expenditures.

Bunker Hill is required by EPA to perform all work required to manage AMD at Bunker Hill Mine. Several activities are described in the Settlement Agreement that related to this responsibility.

***In-Mine Diversion System and Mine Pool***

Bunker Hill has constructed an In-Mine Diversion System and manages the mine pool such that, when so directed by EPA, diverted flows of mine waters will be stored within the mine or discharged at a controlled rate, and not result in uncontrolled discharge to the environment. The following criteria describe the performance criteria to be met:

1 Mine Waters to be Stored: Waters to be stored by purchaser include all mine water which originate upstream of the Barney Switch within the mine, including the east side (Milo) gravity flows, the west side (Deadwood) gravity flows, and the lower country (Mine Pool) pumped flows.

2. Mine Pool Storage Volume: Bunker Hill has provided storage volume using all void space (the mine workings) from a minimum of 30 feet below the sill of 11 Level at the No.2 Raise to the sill of 10 Level at the No.2 Raise.

3. In-Mine Diversion System Construction: Bunker Hill and Placer Mining constructed a diversion dam system in the Kellogg Tunnel downstream from the Barney Switch which backs up all mine waters into the Barney Vent Raise or other appropriate and approved location. The system has the capability to divert a minimum of 7,000 gallons per minute.

4. In-Mine Diversion System Activation: Bunker Hill is required to activate the in- mine diversion system under the following circumstances:

    a. For emergencies: Within 4 hours of notification from EPA, for a duration to be determined and requested by EPA based on the emergency situation, which may occur at any time; and

    b. For Treatment Plant or Conveyance Line Maintenance: Within 14 days of notification from EPA, for a duration to be determined and requested by EPA based on the maintenance required.

5. In-Mine Diversion System Operation and Maintenance: Bunker Hill will maintain and operate the in-mine diversion system until notification from EPA that the system may be decommissioned and removed, in accordance with the following:

    a. The amount of in-mine diversion system building materials continuously kept at the diversion structure location shall be sufficient to divert all flows as required above, and to construct the diversion dam to provide the storage capacity required above.

b. The diversion dam structure, location as described above, and adjoining ditches, are to be kept serviceable and in operable condition at all times for diversion dam construction, operation, and maintenance.

c. The entire in-mine diversion conveyance system (e.g., Barney Vent Raise or other appropriate and EPA-approved location) shall be inspected a minimum of twice per year, and more frequently if there are concerns regarding its ability to convey the capacity required above. Bunker Hill maintains a written report of each inspection.

d. The in-mine diversion conveyance system is cleaned, by hydraulic flushing or other means as necessary, at least once per year, and more frequently if needed to provide the capacity required in above. Bunker Hill is required to inform EPA within 7 days of completing each cleaning.

e. Written diversion dam construction procedures and in-mine diversion system operation and maintenance procedures are posted near the diversion dam structure location. This provides sufficient detail for diversion dam construction, and system operation and maintenance by all crew members. The written diversion dam construction procedures and system operation and maintenance procedures are periodically updated as needed. Bunker Hill is required to provide the written procedures to EPA upon request.

f. Diversion dam construction procedures and system operation and maintenance procedures required above are periodically practiced, at least once per year, or more frequently as needed to ensure the required diversion response time can be met. Bunker Hill is required to inform EPA a minimum of 7 days prior to each diversion dam construction practice.

***Kellogg Portal Contingency Diversion System***

Purchaser shall obtain and store a sufficient quantity of sandbags or other appropriate materials near the entrance to the Kellogg Tunnel with the designated purpose of containing, damming, and/or rerouting any flows into the Kellogg Tunnel ditch, in order to prevent any overland flow outside the ditch.

6. Waters to be diverted: All mine waters that are not contained within the Kellogg Tunnel ditch that are either within the Kellogg Tunnel or outside of the Kellogg Tunnel in the mine yard.

7. Continency Diversion System Materials: Sandbags or other materials that could be easily transported and assembled to route mine water back to the ditch in an emergency situation.

8. Contingency Diversion System Activation:

   a. Deployment of Contingency Diversion System: Within 1 hour of the first indication, or when Bunker Hill knowns or should know, of mine water flowing outside of the Kellogg Tunnel ditch, regardless of cause.

9. Continency Diversion System Operation and Maintenance: Bunker Hill is required to maintain and operate the contingency diversion system until notification from EPA that the system may be decommissioned and removed, in accordance with the following:

   a. The amount of contingency diversion system building materials kept on-hand at all times must be sufficient to divert all flows as required above and shall be deployed in accordance with procedures described above in order to control flows during high flow events or to respond to emergencies.

   b. The contingency diversion system storage location and materials are kept serviceable and in operable condition at all times for contingency diversion system construction and operation.

   c. Written contingency diversion system construction procedures are posted near the diversion system materials storage location. Construction procedures provide sufficient detail for diversion system construction by all crew members. The construction procedures are periodically updated as needed. Bunker Hill is required to provide the construction procedures to EPA upon request.

   d. Contingency diversion system procedures are periodically practiced, at least once per year, or more frequently as needed, to ensure that the required diversion response times as described above can be met. Bunker Hill is required to inform EPA a minimum of7 days prior to each contingency diversion system construction practice.

***Reed Landing Flood Control Project Operations and Maintenance***

10. Bunker Hill conducts operations and maintenance in accordance with the Reed Landing Flood Control Project Operations and Maintenance Manual ("**O&M Manual**"), which is appended to Bunker Hill's Settlement Agreement with EPA.

11. Bunker Hill conducts inspections of the Reed Landing Flood Control Project in accordance with the frequency described in the O&M Manual and fills out the inspection checklist for each inspection. This is provided to EPA and the State of Idaho upon request.

12. Bunker Hill removes snow and takes any other necessary steps to maintain access roads to provide for safe access to the Reed Landing Project area year-round.

Manage mine wastes to prevent a release of such waste into the environment.

***Water discharge permit***

Bunker Hill is required to obtain an IPDES/NPDES permit for its discharge of AMD and any other Bunker Hill Mine-related discharges by May 15, 2023. Until that time, Bunker Hill is required to continue to convey AMD to the Treatment Plant for treatment. EPA may approve the conveyance of other Bunker Hill Mine -related discharges to the Treatment Plant for treatment during this interim period. After May 15, 2023, Bunker Hill is required to treat all AMD and Bunker Hill Mine -related discharges pursuant to an EPA-approved treatment option and in compliance with Section 402 of the Clean Water Act, 33 U.S.C.§1342. Treatment options may include:

a. entering into a lease agreement with EPA providing for Purchaser to lease and operate the Treatment Plant;

b. purchasing and operating the Treatment Plant; or

c. constructing and operating a treatment plant.

Treat any flows from the Reed and Russell portals prior to discharge into surface waters or route back into the Bunker Hill Mine to prevent discharge, without treatment, off-site. Currently all waters are being directed back into the mine.

***Inspections***

13. EPA may require an inspection of the in-mine diversion system to determine compliance with the requirements described above.

14. EPA may have an on-site presence during these activities. At EPA's request, Bunker Hill or Bunker Hill's designee will accompany EPA for inspections during the activities to be performed.

15. Bunker Hill is required to provide any specialty personal protective equipment needed for EPA personnel, transportation, and an escort for any oversight officials to perform their oversight and/or inspection duties within the mine.

16. Upon notification by EPA of any deficiencies during these activities on any component, Bunker Hill is required to take all necessary steps to correct the deficiencies and/or bring the activities into compliance. If applicable, Bunker Hill is required to comply with any schedule provided by EPA in its notice of deficiency.

***Emergency Response and Reporting***

The reporting requirements below are in addition to the reporting required by CERCLA § 103 and/or the Emergency Planning and Community Right-to-Know Act ("**EPCRA**") § 304.

17. If any incident occurs during performance of the activities described above that causes or threatens to cause a release of waste material on, at, or from the Bunker Hill Mine and that either constitutes an emergency situation or that may present an immediate threat to public health or welfare or the environment, Bunker Hill is required to:(1)immediately take all appropriate action to prevent, abate, or minimize such release or threat of release;(2)immediately notify the authorized EPA officer; and (3) take such actions in consultation with the authorized EPA officer.

18. Upon the occurrence of any incident during performance of the activities described above that Bunker Hill is required to report pursuant to Section 103 of CERCLA, 42U.S.C.§9603, or Section 304 of EPCRA, 42U.S.C.§ 11004, Bunker Hill is required to also immediately notify the authorized EPA officer orally.

19. The "authorized EPA officer" for the purposes of immediate oral notifications and consultations is the EPA Remedial Project Manager ("**RPM**"), or the EPA Emergency Response Unit, Region 10 at 206-553-1263 (if the RPM is not available).

20. For any incident covered above, Bunker Hill is required to: (1) within 14 days after the onset of such incident, submit a report to EPA describing the actions or incidents that occurred and the measures taken, and to be taken, in response there to; and (2) within 30 days after the conclusion of such incident, submit a written report to EPA describing all actions taken in response to such incident.

Bunker Hill is required to perform all actions required by its Settlement Agreement with EPA in accordance with all applicable local, state, and federal laws and regulations, except as provided in Section 121(e)of CERCLA, 42U.S.C.§9621(e), and 40C.F.R.§§300.400(e). All on-site actions required pursuant to Bunker Hill's Settlement Agreement with EPA shall attain applicable or relevant and appropriate requirements under federal environmental or state environmental or facility siting laws as set forth in the 1992 Record of Decision and the 2001 Record of Decision Amendment.

Environmental, Social and Health Impact Assessment ("**ESHIA**") – Bunker Hill will conduct a full voluntary ESHIA based on its mine plan and business model that includes deliberate focus on high levels of sustainability. This focus includes:

- Environmental Impact – Reduction of long-term water treatment costs by greater than 75% versus the status quo. This includes a range of initiatives including sealing AMD producing stopes with low porosity paste and source control projects.
- Environmental Impact – Net Positive Impact on biodiversity.
- Emissions – Scope 1 and Scope 2 carbon neutrality.
- Social Impact – Workforce training for residents of Shoshone, Kootenai and Benewah Counties.
- Social Impact – Greater than 80 percent of new job to local residents.
- Social Impact – Compensation for full-time employees that is significantly higher than the median household income for Shoshone County.
- Social impact – Local economic diversification investment.
- Social impact – Employee equity award plan in place by 2023.
- Governance – Labor representation on the Board of Director of the Mining Company.
- Governance – Global Reporting Initiative compliance by 2023.
- Governance – Sustainability Accounting Standards Board and ISO 14001, 14004, 14005 compliant by 2023.

The ESHIA study is anticipated to be completed in Q1 of 2024. The intent of conducting a voluntary ESHIA is to establish a broad spectrum of detailed baseline conditions against which stakeholders and the Company can measure impacts and can generate better informed programming in the future to maximize the positive impacts of the Bunker Hill Mine's activities and mitigate any negative impacts.

Many of the ongoing environmental and sustainability activities are intended to continue far into the future. Efforts such as source control aiming at reducing the infiltration of water into the mine will likely take many forms over time but will continue to some degree for many years. Similarly, water sampling and testing is likely to be only one form of environmental testing that will be a regular recurring activity. These data will provide both insights into new activities that should and will be undertaken in the future and will allow Bunker Hill and all of our stakeholders to measure the impacts of Bunker Hill's environmental management activities. Provision of this data to our stakeholder community will be a core component of communication, development of trust and broad participation in inclusive decision-making.

A paste backfill plant is included in the mine restart plan. This will be a core component of water treatment cost reduction and general mitigation of environmental impacts of past mining activities. The location and size of the stopes in the upper east side of Bunker Hill Mine are well understood by the Bunker Hill Water Management Team. These are the stopes where most of the AMD in the Bunker Hill Mine is produced. Bunker Hill anticipates that AMD reduction from paste production and stope sealing will begin to register in a meaningful way as early as 2025.

As part of the historic data digitization program, as well as through current surveying for mine-design, there have been numerous voids identified underground at the Bunker Hill Mine. A large portion of these open excavations, mainly located on the east side of the mine between the 4-level and 6-level have been light detection and ranging (LiDAR) surveyed. Historically, mining operations at Bunker Hill Mine were a mix of methods, but a large portion of early mining activity on the lower-angle structures accessible between the 9-level and surface were open-stoped without the use of backfill. Continued mine development with the current plan will work to explore and develop access to the existing void spaces adjacent to future mining activity. Under the current plan and specifications of both thickened tailings and binder-added (paste) fill, there is enough identified void space underground to support the deposition of all planned mine processing wastes.

The land package associated with Bunker Hill Mine consists of approximately 400 patented claims, of which approximately 35 include associated surface rights. The Bunker Hill Mine also owns surface parcels unrelated to the federal land-patent process. All of the Bunker Hill Mine property is located in Shoshone County, Idaho.

Some of the parcels have existing buildings on them that will not be used in mining operations. There was a milling parcel previously associated with the Bunker Hill Mine; however, though Bunker Hill has purchased that parcel from Placer Mining, it will not be used in the future for milling. The current mine plan envisions surface operations for crushing, grinding and processing. Furthermore, the mine plan also deposits all tailings underground, which will remove the need for permitting of a tailing storage facility. Development waste rock will be stored on existing mine disturbance areas.

The State of Idaho has several statutory permitting requirements for surface mining and dredge, placer mining. Unlike surface or placer mining, Bunker Hill intends to perform underground hard rock mining activities. Idaho statues do not independently regulate this type of activity on private lands for historical mine site where less than 50% of the ground will be disturbed.

At a local level, the Bunker Hill Mine will be regulated by planning, zoning and building ordinances established by Shoshone County. These ordinances will impose use restrictions for the property, as well as building code requirements for future construction and/or renovations of existing structures. These codes will be reviewed prior to any construction activities or surface activities.

In addition to other requirements, Shoshone County Zoning ordinances create the Bunker Hill Superfund Site Overlay District ("**BD**"), which guides and controls "development in the area known as the federally created Bunker Hill Superfund Site by ensuring compliance with the environmental health code ("**EHC**") and institutional control program ("**ICP**") developed by the BD district. Monitoring compliance with and enforcement of EHC and ICP shall be the responsibility of the Panhandle Health District 1." Shoshone County Ordinance 9-4-17. ICP oversight generally consists of ensuring that the protective barriers put in place to hold the old mining contaminants are not disturbed and ensuring that construction activities would not expose these contaminants (or others) to the environment. Thus, certain permits may be required by the Panhandle Health District prior to any site disturbance activities at the surface of the Bunker Hill Mine.

In terms of federal permitting requirements, the Bunker Hill Mine activities will wastewater and other mine drainage. The Clean Water Act ("**CWA**") requires all point source discharges from mining operations, including discharges from associated impoundments, be authorized under a NPDES permit from the EPA or, in the case of Idaho now, an IPDES permit from the Idaho Department of Environmental Quality. Bunker Hill is required to obtain an NPDES/IPDES permit by May 15, 2023 in accordance with its Settlement Agreement with EPA. Until May 15, 2023, Bunker Hill will be allowed to continue to discharge water to the Central Treatment Plant where it will be charged by EPA for water treatment services that meet existing discharge standards.

This permitting analysis relies on the following assumptions:

- Milling uses conventional froth flotation technology.
- Concentrates produced will be shipped off site and sold to an appropriate smelter facility.
- No public lands are involved in any element of the restart of the project.
- No jurisdictional waters of the U.S. will be impacted.
- No instream work is required nor any impacts to non-jurisdictional wetlands.

The project has a long history of operations and commenced prior to any formal regulatory framework being in place for federal, state, and local agencies. Since all lands are patented mining claims, it eliminates federal land manager permitting and/or National Environmental Policy Act (NEPA). The project will only be subject to the State of Idaho mining regulations.

Idaho Department of Lands regulates surface mining and surface effects of underground mining. The authority to regulate surface effects of underground mining is a more recent change in the regulations. As such, the project is grandfathered and is not subject to the reclamation and bonding of surface disturbance associated with underground mining. It should be noted, however, that the rule will apply when the project expands disturbance. More specifically, Idaho Administrative Procedures Act ("**IDAPA**") 20.03.02(b)(iv) states "Underground mines that existed prior to July 1, 2019 and have not expanded their surface disturbance by 50 percent more after that date." Bunker Hill Mine will not expand surface disturbance by more than 50 percent. Under the current future operating plan and to the extent known, there are no mine closure or reclamation bond requirements that will materially affect operations at the Bunker Hill Mine.

Mine tailings impoundment structure, which is or will be more than 30 feet in height for purposes of storing mine tailings slurry, are subject to the Mine Tailings Impoundment Structure rules (IDAPA 37.03.05). Minimum standards are dictated in the rules. Dry stack tailings are not subject to this rule. Since Bunker Hill Mine will deposit tailings underground this permit will not be required.

Any use of surface or groundwater for "beneficial use" is subject to obtaining a water rights that must be obtained from the Idaho Department of Water Resources. Existing water rights have been reviewed for beneficial use and place of use and this analysis confirms that they are properly allocated.

An air quality permit will be required for any crushing equipment, silos (lime silos, etc.), generators, petroleum fired equipment (lab furnaces, etc.) and other equipment/facilities that have the potential to emit any regulated pollutant or designated hazardous air pollutant

Placement of tailings back underground are authorized by rule as part of mining operations. They are therefore exempt from the groundwater quality standards and permitting requirements but are limited to injection of mine tailings only. The implementation of backfilling cannot affect beneficial use or exceed groundwater standards. If this may occur, the Director has the regulatory

flexibility to require a project to obtain an underground injection control permit. There are no plans for this to occur at the Bunker Hill Mine.

The project will be subject to stormwater permitting if it were to increase its current disturbance footprint by over 50%. There are no plans under planned mine operations that will exceed this limit. At the time of this analysis, EPA still maintains authority of the Multi-sector Industrial Stormwater Project; however, IDEQ has taken over the program on July 1, 2021.

If the project were to provide potable water to the project from water well or surface water, Bunker Hill would be subject to obtaining approval for the public drinking water system. The provision is subject to providing water to more than 25 people. If water is supplied from a municipality, there is no requirement to apply for this permit. Municipally supplied water connections are planned for surface building modifications in the Kellogg yard.

**Capital and Operating Costs**

Much of the vast underground workings, surface portals, mine office, maintenance complex, and 9-level shaft access points for the Bunker Hill Mine remain intact. The KT portal adjacent to the surface infrastructure at the Kellogg mine yard connects horizontally by rail to the underground hoisting facilities on 9-level, approximately 9,500 feet to the south. Water seepage above the 9-level drains naturally out of the KT, laterals below the 9-level must be dewatered prior to development and production. All water is collected at the portal and sent to the Treatment Plant for treatment. The underground workings are extensive, and only the infrastructure germane to the reopening of the mine is being described in the PFS. Several shafts and raises connect to the 9-level and its underground infrastructure is central to the mine and home to the #1 and #2 hoistrooms, material bins, substations and shops. Shafts at the mine are inclined rail; the #1 being the production shaft and #2 materials and personnel. The mine is currently accessed by the KT from the Kellogg mine yard and the 5-level Russell portal at the Wardner mine yard located just above the town of Wardner to the south. The Newgard Ramp will be extended from the 5-level portal down to the 15-level and serve as personnel, materials and supplies access as well as the main haulage out of the mine. Mine capital and operating costs were developed by Minetech and are based on the rates of the current contractors, CMC. Efficiency factors are based on Idaho and other similar operating mines as well as the work CMC is currently performing driving the Newgard ramp. Milling and process capital and operating costs were developed by Barr Engineering and Bunker Hill with YaKum Consulting providing the process and metallurgical test work. Patterson & Cooke provided design and capital cost estimates for the hydraulic backfill facilities with Bunker Hill.

Bunker Hill has as of August 31, 2022 purchased the Teck Pend Oreille process plant, much of their electrical gear, and other miscellaneous equipment including fans, spare parts inventories, power cable, etc. Most of the Pend Oreille equipment has been relocated to the Kellogg yard. The Pend Oreille mine is going through closure and Bunker will purchase more equipment as it becomes available. Bunker has also purchased or is leasing to purchase several pieces of underground equipment. Owned equipment is not included in the capital equipment estimate.

Contingency was applied to task groups based on the estimate quality. Bunker Hill has already either purchased or received pricing quotations and contracts in place for a majority of the Capital Development and Capital Mobile Equipment items allowing for a 5% contingency to be assigned. To reflect the current state of engineering on the process plant and paste backfill plant, as well as discussions with engineering, procurement and construction management ("**EPCM**") groups, 15% and 10% contingencies were applied to Capital Infrastructure and EPCM and Other Construction Allowances, respectively. The Avista $1M payment for substation and line power improvement includes contingency on the up-front capital cost with capital credits against operating cost in later years or effectively a 0% contingency.

The utilization of the existing underground infrastructure allows for a restart of the mine with a relatively low initial capital investment. Annual and life-of-mine ("**LOM**") capital is summarized in Table 4 below. A variable contingency was applied to all capital costs averaging 8% over LOM. With the acquisition of the Pend Oreille process plant equipment, current level of mill and process plant engineering and known contractor mining unit costs, the authors of the Technical Report believe the above stated contingency value to represent the current state of the Bunker Hill Mine project. The overall expected accuracy of the estimate is +/- 20%.

**Table 4 – Bunker Hill Capital Expenditure Schedule**

| **Bunker Hill Mining Corporation** Prefeasibility Study (PFS) $USD | LOM - Total (Year 1- LOM) | 2022 | 2023 | 2024 | 2025 | 2026 | 2027 | 2028 |
|---|---|---|---|---|---|---|---|---|
| Ramp & Lateral Development/Rehab | | 2,972,970 | 3,396,797 | 9,550,141 | 11,436,323 | 10,383,194 | 22,710,890 | 4,035,145 |
| Ventilation Development and Pumps | | | | 50,000 | 1,040,208 | 436,046 | 1,079,456 | 121,512 |
| Vertical Development | | | | | 180,000 | 720,000 | 1,320,000 | 780,000 |
| **Capital Development** | **70,212,683** | **2,972,970** | **3,396,797** | **9,600,141** | **12,656,531** | **11,539,240** | **25,110,346** | **4,936,657** |
| *Contingency* | **3,510,634** | **148,649** | **169,840** | **480,007** | **632,827** | **576,962** | **1,255,517** | **246,833** |
| One Additional Drill Jumbo | 250,000 | | | 250,000 | | | | |
| Two Bench Drills | 500,000 | | 250,000 | 250,000 | | | | |
| Loader (in transit lease to buy) | 300,000 | 20,000 | 240,000 | 40,000 | | | | |
| Loader (Teck) | 150,000 | | 150,000 | | | | | |
| Three Additional UG Trucks | 540,000 | | | 180,000 | 180,000 | 180,000 | | |
| Ancillary UG Support Equipment | 326,700 | 9,900 | 49,500 | 59,400 | 59,400 | 59,400 | 59,400 | 29,700 |
| Telehandler - Surface | 175,000 | 175,000 | | | | | | |
| UG Transport | 120,000 | 60,000 | | 60,000 | | | | |
| Light Vehicals | 130,000 | | | 130,000 | | | | |
| **Capital Mobile Equipment** | **2,491,700** | **264,900** | **689,500** | **969,400** | **239,400** | **239,400** | **59,400** | **29,700** |
| *Contingency* | **124,585** | **13,245** | **34,475** | **48,470** | **11,970** | **11,970** | **2,970** | **1,485** |
| Primary Power Feed - Avista | 330,000 | 410,000 | 1,013,000 | (297,000) | (297,000) | (297,000) | (202,000) | |
| UG Power Distribution - Main | 270,000 | 30,000 | 240,000 | | | | | |
| Backfill Plant | 5,190,700 | | 5,190,700 | | | | | |
| Backfill Distribution | 1,415,200 | | 1,015,200 | | 100,000 | 100,000 | 200,000 | |
| Mill and Process | 26,764,000 | 4,300,000 | 22,464,000 | | | | | |
| Utilities, Comms, Fans, Compressors | 880,000 | 340,000 | 50,000 | 265,000 | 225,000 | | | |
| Building Upgrades | 325,000 | 75,000 | 250,000 | | | | | |
| **Capital Infrastructure** | **35,174,900** | **5,155,000** | **30,222,900** | **(32,000)** | **28,000** | **(197,000)** | **(2,000)** | **0** |
| *Contingency* | **4,855,690** | **730,500** | **4,145,490** | **(3,200)** | **2,800** | **(19,700)** | **(200)** | **0** |
| Other Engineering Allowance | 100,000 | | | 100,000 | | | | |
| Permitting | 25,000 | 25,000 | | | | | | |
| Technical Services Equipment | 150,000 | 50,000 | 100,000 | | | | | |
| Mine Safety | 160,000 | 40,000 | 120,000 | | | | | |
| Geotechnical Engineering | 150,000 | | 150,000 | | | | | |
| Rentals, Offices, | 196,389 | 62,677 | 133,712 | | | | | |
| EPCM Process | 3,582,044 | 1,155,282 | 2,426,762 | | | | | |
| EPCM Backfill | 1,039,313 | 302,450 | 736,863 | | | | | |
| Bunker Hill Staff Allocated | 1,529,412 | 470,588 | 1,058,824 | | | | | |
| **EPCM Other Construction Allowances** | **6,932,158** | **2,105,998** | **4,726,160** | **100,000** | **0** | **0** | **0** | **0** |
| *Contingency* | **693,216** | **210,600** | **472,616** | **10,000** | **0** | **0** | **0** | **0** |
| Mine Development | 200,000 | | | | 100,000 | 50,000 | 50,000 | |
| Mobile Equipment | 600,000 | | | 125,000 | 125,000 | 125,000 | 225,000 | |
| Mine Infrastructure | 200,000 | | | | 100,000 | 50,000 | 50,000 | |
| Process Engineering | 600,000 | | | 150,000 | 150,000 | 150,000 | 150,000 | |
| Surface Facilities | 100,000 | | 50,000 | | | 50,000 | | |
| Dewatering | 120,000 | | 30,000 | | 30,000 | 30,000 | 30,000 | |
| **Capital Sustaining** | **1,820,000** | **0** | **80,000** | **275,000** | **505,000** | **455,000** | **505,000** | 0 |
| *Contingency* | **182,000** | **0** | **8,000** | **27,500** | **50,500** | **45,500** | **50,500** | 0 |
| **Total Capital** | **116,631,441** | **10,498,868** | **39,115,358** | **10,912,541** | **13,428,931** | **12,036,640** | **25,672,746** | **4,966,357** |
| **Capital Contingency** | **9,366,125** | **1,102,993** | **4,830,421** | **562,777** | **698,097** | **614,732** | **1,308,787** | **248,318** |
| **Total Capital W/Cont, $USD** | **125,997,566** | **11,601,861** | **43,945,778** | **11,475,318** | **14,127,028** | **12,651,372** | **26,981,533** | **5,214,675** |

Credits are shown for Bunker funded Avista power upgrades which are credited back.

LOM mine capital improvements include the following:

- connect the 5-level Warder portal Newgard ramp to the 9-level then down to 15-level;
- new ramp and raise level access;
- all rubber tire access;
- ventilation system including fans, controls, raise manways;
- upgrade site wide main power distribution (Avista Utilities);
- install new mine wide power distribution down from Wardner – new high voltage cable is already installed in the KT;
- install Sentinel communications from the surface to the main underground facilities;

- install a hydraulic backfill plant at the Wardner 5-level yard; allows efficient access to cement and reagents;
- install a primarily pumped and gravity backfill distribution system to active and historical mining areas; and
- construct new mill building and processing facility at the Kellogg mine yard.

**Table 5 – Proposed Work Program to Advance Bunker Hill**

| Activity | Amount |
|---|---|
| Geophysical Interpretation and Additional Geophysics | $0.05M |
| Environmental Studies | $0.03M |
| Geotechnical Studies | $0.15M |
| Mill and Process Plant Engineering | $1.70M |
| Hydraulic Backfill and Tailing Placement Engineering | $0.50M |
| **Total Recommended Budget** | **$2.43M** |

Mine operating costs are based on experienced local contract labor and Bunker Hill owed equipment for mining operations. A zero-based efficiency and cost estimate was completed based on the current underground contractors' rates and current material costs. Electrical power costs are scheduled based on projected motor loads applying power factor correction, and applicable Avista Utilities rates for all projected mine, milling and site operations. Mining costs are based on CF (3% of tonnage) techniques and LHOS (87% of tonnage). Power usage and consumption has been divided between the mine, mill and surface yards. The mine carries the power cost for the hydraulic backfill plant. Site general and administrative ("**G&A**") costs include power costs for site mine offices, area lighting and changeroom facilities.

Mill operating costs are scheduled. Mine site G&A costs are determined based on anticipated staffing levels and compensation compatible with area salaries. Mill power consumption is based on 1,800 tons per day.

**Table 6 –LOM and Annual Mine Operating Costs**

| Bunker Hill Mining Corporation<br>Prefeasibility Study (PFS) $USD | LOM - Total<br>(Year 1- LOM) | 2022 | 2023 | 2024 | 2025 | 2026 | 2027 | 2028 |
|---|---|---|---|---|---|---|---|---|
| Definition Drilling | 1,744,484 | - | 37,358 | 319,681 | 326,157 | 337,853 | 349,575 | 373,859 |
| LHOS Stope Development | 39,947,480 | - | 2,286,898 | 6,969,536 | 12,652,419 | 7,631,406 | 5,458,492 | 4,948,728 |
| LHOS Stope Production | 73,990,906 | - | 1,165,584 | 14,868,167 | 10,660,459 | 15,018,032 | 16,134,870 | 16,143,793 |
| Cut and Fill Production | 4,974,182 | - | - | - | - | - | - | 4,974,182 |
| Processing Cost | 70,978,124 | - | 1,632,267 | 13,766,489 | 13,842,115 | 13,842,115 | 13,842,115 | 14,053,023 |
| Mine G&A incl. Power | 32,380,103 | 798,412 | 3,611,335 | 6,720,190 | 7,016,217 | 7,046,596 | 7,046,596 | 5,270,914 |
| **Total Operating Cost, $USD** | 229,145,435 | **798,412** | **8,733,442** | **42,644,063** | **44,497,367** | **43,876,002** | **42,831,649** | **45,764,500** |

Bunker Hill direct hire staffing for the overall mine and process operations, and the indirect contractor overhead and maintenance for the mine were scheduled based on estimated staffing levels. Only mining will be performed with contract labor. Contingency was not added to estimated operating costs and the level of accuracy is estimated at +/- 15%.

The economic analysis is based on an 1,800 stpd mine plan utilizing cut-and-fill and long hole open stoping with backfill. Metal recoveries are based on current metallurgical test work and historical mill operational data. Silver will be recovered in the lead concentrate and any silver reporting to the zinc concentrate is considered non-payable. This is consistent with typical smelter treatment charges and agreements. Projected metal prices of $1.20/lb zinc, $1.00/lb lead and $20.00/t-oz silver were used to calculate revenues for the full life of mine. Escalation was not applied to operating or capital costs other than a slight operating cost increase later in the mine life to reflect operating from the deeper-mine levels.

An initial capital investment of $55 million (including variable contingency) is required to restart the mine. Bunker Hill is projected to generate approximately $25 million of annual average free cash flow over an initial 5-year mine life based on the current probable reserves. It will produce over 316 million pounds of zinc, 146 million pounds of lead, and 3 million ounces of silver at an all-in sustaining cost of $0.77 per payable pound of zinc (net of by-products).

The project is expected to generate pre-tax free cash flow of $94 million over its 5-year mine life and $86 million on an after-tax basis. The Company's goal is to significantly increase the free cash flow by multiple optimization work streams including mill and process throughput and recovery, resource expansion and exploration.

A US mining-focused tax consulting firm prepared the U.S. federal and Idaho state tax computations based on the Internal Revenue Code of 1986, as amended and the regulations thereunder and the Idaho Revenue and Taxation Statute – Title 63 as in effect as of April 10, 2021. The tax elections assumed and incorporated in the tax computation are the Bunker Hill:

1. is a single mine and property under Section 614;
2. will expense exploration expenditures as incurred;
3. will elect to treat mine development costs as incurred as deferred expenses under Section 606(b);
4. will elect out of Section 168(K) bonus depreciation;
5. will depreciate long-lived assets under the unit of production basis under Section 168(f)(1);
6. other assets will be depreciated under MACRS in accordance with Rev. Proc. 87-56; and
7. all metal sales will be delivered outside of the United States and are therefore eligible for the FDII deduction under Section 250.

Property taxes and the Idaho Mine License tax are included as operating costs. Idaho Mine License tax is 1% of taxable mine income less depletion expense.

Bunker Hill has executed a $50M USD term sheet with Sprott outlining a mine financing package to fund mine restart activities in multiple stages. The financing package includes the Stream of up to $37M, as more particularly described above.

Based on these free cash flow estimates, the financial model indicates an internal rate of return of 36% with a 2.1-year payback and a net present value (NPV) of approximately $63 million at a 5% discount rate, or $52 million at an 8% discount rate. A 5% discount rate is often utilized with precious metals projects, while an 8% discount rate is often used with base metals projects. Lower discount rates are also typically associated with lower risk jurisdictions. Given the polymetallic nature of the Bunker Hill Mine, the historic and future importance of silver to the project's economic value, the low-risk jurisdiction of Idaho, USA, and the low interest rate environment as of the date of the Technical Report, it is helpful to understand the project valuation for both a 5% and 8% discount rate.

**Economic Summary**

The summary of the current projected financial performance of the Bunker Hill Mine is listed in Table 7 below. Sensitivities are summarized in Table 8 below.

**Table 7 – Bunker Hill Mine Economic Summary**

| Year | Initial Capex | 1 | 2 | 3 | 4 | 5 | TOTAL | ANNUAL AVERAGE |
|---|---|---|---|---|---|---|---|---|
| Metal Prices | | | | | | | | |
| Zinc ($/lb) | 1.5 | 1.4 | 1.3 | 1.25 | 1.25 | 1.25 | **1.29** | **1.29** |
| Lead ($/lb) | 0.95 | 0.95 | 0.95 | 0.95 | 0.95 | 0.95 | **0.95** | **0.95** |
| Silver ($/oz) | 22 | 22 | 22 | 21.5 | 21.5 | 21.5 | **21.7** | **21.7** |
| Mine plan | | | | | | | | |
| Ore mined (kt) | 77 | 652 | 655 | 655 | 655 | 665 | **3,360** | **657** |
| Zinc grade (%) | 5.90% | 5.60% | 4.70% | 5.70% | 5.70% | 5.90% | **5.50%** | **5.50%** |
| Lead grade (%) | 2.10% | 2.40% | 2.70% | 2.90% | 2.40% | 1.90% | **2.50%** | **2.50%** |
| Silver grade (oz/t) | 0.5 | 0.7 | 1.3 | 1.4 | 1.2 | 0.8 | **1.1** | **1.1** |
| Zinc eq grade (%) | 7.70% | 8.00% | 8.10% | 9.40% | 8.80% | 8.20% | **8.50%** | **8.50%** |
| Production | | | | | | | | |
| Zinc concentrate (t) | 6,671 | 53,504 | 44,852 | 54,997 | 55,061 | 57,909 | **272,995** | **53,265** |
| Lead concentrate (t) | 2,091 | 20,945 | 23,577 | 25,078 | 20,955 | 16,605 | **109,251** | **21,432** |
| Zn grade - Zn conc (%) | 58.00% | 58.00% | 58.00% | 58.00% | 58.00% | 58.00% | **58.00%** | **58.00%** |
| Pb grade - Pb conc (%) | 67.00% | 67.00% | 67.00% | 67.00% | 67.00% | 67.00% | **67.00%** | **67.00%** |
| Ag grade - Pb conc (oz/t) | 14.4 | 18.6 | 31.5 | 30.1 | 31 | 27.4 | **27.6** | **27.7** |
| Zn prod. - Zn conc (klbs) | 7,738 | 62,065 | 52,029 | 63,796 | 63,871 | 67,174 | **316,674** | **61,787** |
| Pb prod. - Pb conc (klbs) | 2,802 | 28,067 | 31,593 | 33,605 | 28,080 | 22,251 | **146,397** | **28,719** |
| Ag prod. - Pb conc (koz) | 30 | 390 | 742 | 754 | 649 | 455 | **3,020** | **598** |
| Zinc eq produced (klbs) | 9,954 | 87,233 | 87,679 | 102,310 | 96,375 | 91,909 | **475,460** | **93,101** |
| Cost metrics | | | | | | | | |
| Mining ($/t) | | 35 | 38 | 37 | 35 | 41 | **37** | **37** |
| Processing ($/t) | | 21 | 21 | 21 | 21 | 21 | **21** | **21** |
| G&A ($/t) | | 9 | 9 | 9 | 9 | 6 | **9** | **9** |
| Opex - total ($/t) | | 65 | 68 | 67 | 65 | 69 | **67** | **67** |
| Sustaining capex ($/t) | | 18 | 22 | 19 | 41 | 8 | **21** | **21** |
| Cash costs: by-prod. ($/lb Zn payable) | | 0.61 | 0.42 | 0.36 | 0.45 | 0.64 | **0.5** | **0.5** |
| AISC: by-prod. ($/lb Zn payable | | 0.82 | 0.74 | 0.59 | 0.95 | 0.73 | **0.77** | **0.77** |
| FCF & Valuation ($000's) | | | | | | | | |
| Zinc revenue | | 73,857 | 57,492 | 67,784 | 67,863 | 71,373 | **338,368** | **67,674** |
| Lead revenue | | 25,330 | 28,513 | 30,328 | 25,342 | 20,081 | **129,595** | **25,919** |
| Silver revenue | | 7,900 | 15,515 | 15,406 | 13,256 | 9,260 | **61,337** | **12,267** |
| Gross revenue | | 107,087 | 101,520 | 113,518 | 106,461 | 100,714 | **529,300** | **105,860** |
| TC - Zinc conc | | -16,257 | -11,138 | -13,657 | -13,673 | -14,380 | **-69,105** | **-13,821** |
| TC - Lead conc | | -3,698 | -4,162 | -4,428 | -3,700 | -2,932 | **-18,919** | **-3,784** |
| RC - Lead conc | | -449 | -882 | -896 | -771 | -538 | **-3,535** | **-707** |
| Land freight | | -2,193 | -2,019 | -2,360 | -2,239 | -2,192 | **-11,002** | **-2,200** |
| Net smelter return | | 84,491 | 83,319 | 92,178 | 86,079 | 80,672 | **426,739** | **85,348** |
| Mining costs | | -22,828 | -24,592 | -23,971 | -22,927 | -27,454 | **-121,772** | **-24,354** |
| Processing costs | | -13,766 | -13,842 | -13,842 | -13,842 | -14,053 | **-69,346** | **-13,869** |
| G&A costs | | -6,050 | -6,063 | -6,063 | -6,063 | -4,257 | **-28,496** | **-5,699** |
| **EBITDA** | | **41,847** | **38,822** | **48,302** | **43,247** | **34,908** | **207,126** | **41,425** |
| Sustaining capex | | -11,475 | -14,127 | -12,651 | -26,982 | -5,215 | **-70,450** | **-14,090** |
| Initial capex | -54,853 | | | | | | **-54,853** | **-** |
| Land & salvage value | | | | | | 12,281 | **12,281** | **12,281** |
| **Pre-tax free cash flow** | **-54,853** | **30,372** | **24,695** | **35,650** | **16,266** | **41,974** | **94,103** | **29,791** |
| Taxes | -511 | -1,394 | -1,382 | -2,218 | -1,155 | -1,224 | -7,884 | **-1,475** |
| **Free cash flow** | **-55,364** | **28,978** | **23,313** | **33,432** | **15,111** | **40,750** | **86,219** | **28,317** |
| **NPV (5%)** | **62,826** | | | | | | | |
| **NPV (8%)** | **51,813** | | | | | | | |
| **IRR (%)** | **36.00%** | | | | | | | |
| **Payback (years)** | **2.1** | | | | | | | |

**Table 8 – Sensitivity Analysis**

| | Metal Prices | | | | | | | Operating & Capital Costs | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| | | | Zinc Price ($/lb) | | | | | | | Operating Costs (+/- %) | | | | |
| | | | -20% | -10% | - | 10% | 20% | | | -20% | -10% | - | 10% | 20% |
| NPV (8%) ($M) | Lead Price ($/lb) | -20% | -7 | 13 | 32 | 51 | 68 | Total Capital Costs (+/- %) | -20% | 102 | 87 | 72 | 56 | 40 |
| | | -10% | 4 | 23 | 42 | 60 | 78 | | -10% | 92 | 77 | 62 | 46 | 30 |
| | | - | 14 | 33 | **52** | 69 | 87 | | - | 82 | 67 | **52** | 36 | 19 |
| | | 10% | 24 | 43 | 61 | 78 | 96 | | 10% | 72 | 57 | 42 | 25 | 9 |
| | | 20% | 34 | 53 | 70 | 87 | 105 | | 20% | 62 | 47 | 31 | 15 | -1 |
| | | | Zinc Price ($/lb) | | | | | | | Operating Costs (+/- %) | | | | |
| | | | -20% | -10% | - | 10% | 20% | | | -20% | -10% | - | 10% | 20% |
| IRR (%) | Lead Price ($/lb) | -20% | 4% | 16% | 26% | 35% | 44% | Total Capital Costs (+/- %) | -20% | 71% | 62% | 53% | 44% | 34% |
| | | -10% | 10% | 21% | 31% | 40% | 49% | | -10% | 60% | 52% | 44% | 35% | 26% |
| | | - | 16% | 26% | **36%** | 45% | 53% | | - | 51% | 44% | **36%** | 28% | 19% |
| | | 10% | 22% | 32% | 41% | 49% | 57% | | 10% | 44% | 37% | 29% | 21% | 13% |
| | | 20% | 27% | 37% | 45% | 54% | 62% | | 20% | 37% | 30% | 23% | 15% | 7% |

## Conclusions

The Technical Report demonstrates that the restart of the Bunker Hill Mine can reasonably be expected to generate a positive return on investment with an after-tax internal rate of return of 36% based on the reserves presented. It is reasonable to expect the conversion of inferred resources to indicated resources and indicated resources to measured resources to continue. Inferred mineral resources are considered too geologically speculative to have economic considerations applied to them to be classified as a mineral reserve.

The Technical Report is based on all available technical and scientific data available as of August 29, 2022. Mineral resources are considered by the qualified persons to meet the reasonable prospects of eventual economic extraction due two main factors; 1) cut-off grades are based on scientific data and assumptions related to the project and 2) mineral resources are estimated only within blocks of mineralization that have been accessible in the past by mining operations as well as by using generally accepted mining and processing costs that are similar to many projects in Idaho.

# PLAN OF DISTRIBUTION

This Prospectus qualifies the distribution of the Offered Shares offered for sale pursuant to the Offering. The Offered Shares will be offered in each of the provinces of Canada, except Quebec, through the Agents or their affiliates who are registered to offer the Offered Shares for sale in such provinces and such other registered dealers as may be designated by the Agents.

Pursuant to the Agency Agreement, the Company will engage the Agents as its agents to offer for sale to the public on a commercially reasonable "best efforts" basis without agent liability, and the Company will agree to issue and a minimum of ● Offered Shares and a maximum of ● Offered Shares, at a price of C$● per Offered Share, for minimum aggregate gross proceeds of C$7,000,000 and maximum aggregate gross proceeds of C$12,000,000, subject to the terms and conditions to be contained in the Agency Agreement. In consideration for the services rendered by the Agents in connection with the Offering, the Agents will be paid the Agents' Commission representing 6.0% of the aggregate gross proceeds of the Offering, equal to C$0.4 million if the Minimum Offering is achieved and C$0.7 million if the Maximum Offering is achieved (each assuming no exercise of the Over-Allotment Option and no sales to investors on the President's List or sales to Company Purchasers), subject to a reduced fee equal to: 3.0% of the gross proceeds from sales to certain purchasers designated by the Company on the President's List; and (ii) 2.0% of the gross proceeds from sales to Company Purchasers. All fees payable to the Agents will be paid out of the proceeds of the Offering. The Offering Price was determined by negotiation between the Company and Echelon, on behalf of the Agents, with reference to the prevailing market price of the issued and outstanding Common Shares.

As additional consideration for the services rendered in connection with the Offering, the Company has also agreed to issue the Agents such number of Compensation Warrants as is equal to 6.0% of the number of Offered Shares issued pursuant to the Offering, including any Offered Shares sold on the exercise of the Over-Allotment Option, provided that such number shall be reduced to: (i) 3.0% with respect to Offered Shares sold to purchasers on the President's List; and (ii) 2.0% with respect to Offered Shares sold to Company Purchasers. Each Compensation Warrant is exercisable to purchase one Compensation Warrant Share at an exercise price of $● per Compensation Warrant Share for a period of 24 months following the Closing Date, subject to adjustment in certain events. The distribution of the Compensation Warrants is qualified under this Prospectus.

The Company has granted to the Agents the Over-Allotment Option, exercisable on or before 8:00 a.m. (PST) on the date that is 30 days after the Closing Date, to purchase up to such number of Additional Offered Shares as is equal to 15% of the number of Offered Shares sold pursuant to the Offering, to cover over-allocations, if any, made by the Agents and for market stabilization purposes. The purchase price for the Additional Offered Shares pursuant to the Over-Allotment Option will be equal to the Offering Price. If the Minimum Offering is completed and the Over-Allotment Option is exercised in full (assuming no sales to investors on the President's List and no sales to Company Purchasers), after payment of the Agents' Commission of approximately C$0.5 million and estimated expenses of this Offering of approximately C$0.4 million, the estimated net proceeds from this Offering will be approximately C$7.2 million. If the Maximum Offering is completed and the Over-Allotment Option is exercised in full (assuming no sales to investors on the President's List and no sales to Company Purchasers), after payment of the Agents' Commission of approximately C$0.8 million and estimated expenses of this Offering of approximately C$0.4 million, the estimated net proceeds from this Offering will be approximately C$12.6 million

The Agents have reserved the right to offer selling group participation, in the normal course of the brokerage business, to selling groups of other licensed broker-dealers, brokers or investment dealers.

The obligations of the Agents under the Agency Agreement are several, and not joint, nor joint and several, and may be terminated at their discretion upon the occurrence of certain stated events, including, if prior to the closing of the Offering: (a) there shall occur or come into effect any material change in the business, affairs or financial condition or financial prospects of the Company or its subsidiaries, or any change in a material fact or new material fact shall arise, or there should be discovered any previously undisclosed material fact which, in each case, in the reasonable opinion of the Agents has or would be expected to have a significant adverse effect on the market price or value or marketability of the Offered Shares; or (b) there should develop, occur or come into effect or existence any event, action, state or condition (including without limitation, terrorism or accident) or major financial, political or economic occurrence of national or international consequence, any declared pandemic of a serious contagious disease (including the COVID-19 pandemic, to the extent that there is any material adverse development related thereto after the date hereof, or similar event or the escalation thereof), or any action, government, law, regulation, inquiry or other occurrence of any nature, which in the sole opinion of the Agents, seriously adversely affects or involves or may seriously adversely affect or involve the financial markets in Canada or the United States or the business, operations or affairs of the Company and its subsidiaries taken as a whole or the marketability of the Offered Shares; or (c) (i) any inquiry, action, suit, proceeding or investigation (whether formal or informal) (including matters of regulatory transgression or unlawful conduct) is commenced, announced or threatened in relation to the Company or any one of the officers, directors or principal shareholders of the Company where wrong-doing is alleged or any order made by any federal, provincial, state, municipal or other governmental department, commission, board, bureau, agency or instrumentality including, without limitation, the CSE or any securities regulatory authority which involves a finding of wrong doing; or (ii) any order, action, proceeding, law or regulation is made, threatened, enacted or changed which ceases trading in the Company's securities or, in the opinion of the Agents, acting reasonably, operates to prevent or restrict the trading of the common shares of the Company; or (d) the state of the financial markets in Canada, the United States or elsewhere where it is planned to market the Offered Shares is such that in the reasonable opinion of the Agents, the Offered Shares cannot be marketed profitably; or (e) the Agents are not satisfied in its sole discretion with its due diligence review and investigations in respect of the Company; or (f) the Company is in breach of any material term, condition or covenant of the Agency Agreement that may not be reasonably expected to be remedied prior to the closing time of the Offering or any representation or warranty given by the Company in the Agency Agreement becomes or is false.

The expenses of this Offering, not including the Agents' Commission, are estimated to be C$0.4 million and are payable by the Company. The aggregate Agents' Commission will be C$0.4 million if the Minimum Offering is achieved ($● per Offered Share or 6% of the gross proceeds) and $0.7 if the Maximum Offering is achieved ($● per Offered Share or 6% of the gross proceeds), in both cases excluding the exercise of the Over-Allotment Option.

**The Offering is not underwritten or guaranteed by any person.** Subscriptions will be received subject to rejection or allotment in whole or in part and the Agents reserve the right to close the subscription books at any time without notice. Subscription proceeds will be received by the Agents, or by any other securities dealer authorized by the Agents, and will be held by the Agents in trust until subscriptions for the Minimum Offering are received and other closing conditions of the Offering have been satisfied. If subscriptions for the Minimum Offering have not been received within 90 days following the date of issuance of a receipt for the final prospectus, the Offering will not continue and the subscription proceeds will be returned to subscribers, without interest or deduction. In any event, the total period of the distribution will not end more than 90 days from the date of issuance of a receipt for the final prospectus. Should a closing occur in respect of the Minimum Offering, one or more additional closings, if necessary, may occur until the earlier of the Maximum Offering being subscribed and the expiry of the 90-day period. Provided the Minimum Offering is met, closing of the Offering is expected to take place on or about ●, 2022, or such other date as may be agreed upon by the Company and the Agents.

Except as set forth herein, it is anticipated that the Offered Shares will be delivered under the book-based system through CDS, DTC or their nominee, as applicable, and deposited in electronic form with CDS or DTC, as applicable, on the Closing Date. The Company will cause a global certificate or certificates (in physical or electronic form) representing any Offered Shares to be delivered to, and registered in the name of, CDS, DTC or their nominee, as applicable. As long as the Offered Shares are held through CDS or DTC, as applicable, rights of shareholders must be exercised through, and all payments or other property to which such holder is entitled will be made or delivered by, CDS, DTC or the registered dealer, broker, bank or other financial institution (each, a "**Depository Participant**") through which the shareholder holds such Offered Shares. Each person who acquires Offered Shares under the Offering will receive only a customer confirmation of purchase from the Depository Participant from or through which the Offered Shares are acquired in accordance with the practices and procedures of that Depository Participant. The practices of Depository Participants may vary, but generally customer confirmations are issued promptly after execution of a customer order. CDS and DTC, as applicable, are responsible for establishing and maintaining book-entry accounts for their Depository Participants having interests in the Offered Shares.

Pursuant to the Agency Agreement, the Company has agreed, for a period of 90 days following the Closing Date, not to, directly or indirectly, offer, issue, sell, grant, or dispose of, or announce any intention to do so, in any manner whatsoever, any Common Shares or any other securities convertible into, exchangeable for, or otherwise exercisable to acquire Common Shares or other equity securities of the Corporation, without the prior written consent of the Echelon (such consent not to be unreasonably withheld or delayed), other than in connection with (i) the exchange, transfer, conversion or exercise rights of existing outstanding securities; (ii) the issuance of options under the Company's stock option plan, provided that the exercise price of any such options is not less than the Offering Price; (iii) the issuance of deferred share units or restricted share units under the Company's deferred share unit plan or restricted share unit plan; (iv) existing commitments to issue securities; (v) an arm's length acquisition (including to acquire assets or intellectual property rights); (vi) under the Offering; (vii) the issuance of securities to Sprott or affiliates of Sprott in accordance with the applicable agreements with Sprott; or (viii) the issuance of securities in connection with any offtake-related debt financing.

Pursuant to the Agency Agreement, it is a condition of closing the Offering that the Corporation obtain from each of the executive officers and directors of the Corporation an undertaking in favour of the Agents pursuant to which such person has agreed not to sell, transfer or pledge, or otherwise dispose of, any securities of the Corporation for a period of 90 days after the Closing Date, without the consent of the Echelon, such consent not to be unreasonably withheld or delayed, except in connection with a take-over bid, arrangement or similar transaction involving the acquisition of the Company.

The Company has agreed to indemnify and hold harmless the Agents, each of their respective subsidiaries and affiliates, and each of their respective directors, officers, employees, partners, agents, shareholders, each other person, if any, controlling the Agents, or any of their respective subsidiaries and affiliates, from and against certain liabilities and expenses and to contribute to the amount paid or payable by the Agents or the other Indemnified Party (as defined in the Agency Agreement) as a result of such Claim (as defined in the Agency Agreement) in such proportion as is appropriate to reflect not only the relative benefits received by the Company on the one hand and the Agents or any other Indemnified Party on the other hand but also the relative fault of the Company, the Agents or any other Indemnified Party as well as any relevant equitable considerations; provided that the Company shall in any event contribute to the amount paid or payable by the Agents or any other Indemnified Party as a result of such Claim any excess of such amount over the amount of the fees received by the Agents under the Agency Agreement.

The Common Shares are listed for trading on the CSE and the OTCQB Venture Market. The Company has given notice to the CSE to list the Offered Shares distributed under this Prospectus on the CSE. Such listing will be subject to Bunker Hill fulfilling all of the listing requirements of the CSE.

Pursuant to the rules and policy statements of certain Canadian securities regulators, the Agents may not, at any time during the period ending on the date the selling process for the Offered Shares ends and all stabilization arrangements relating to the Offered Shares are terminated, bid for or purchase Common Shares for their own account or for accounts over which they exercise control or direction. The foregoing restrictions are subject to certain exceptions including a bid for or purchase of Common Shares: (i) if the bid or purchase relates to market stabilization or market balancing activities and is made through the facilities of a recognized stock exchange, in accordance with the Universal Market Integrity Rules of the Investment Industry Regulatory Organization of Canada; (ii) made for or on behalf of a client, other than certain prescribed clients, provided that the client's order was not solicited by the Agents, or if the client's order was solicited, the solicitation occurred before the commencement of a prescribed restricted period; and (iii) to cover a short position entered into prior to the commencement of a prescribed restricted period. The Agents may engage in market stabilization or market balancing activities on the CSE where the bid for or purchase of Common Shares is for the purpose of maintaining a fair and orderly market in the Common Shares, subject to price limitations applicable to such bids or purchases. Such transactions, if commenced, may be discontinued at any time.

**This Prospectus does not constitute an offer to sell or a solicitation of an offer to buy any of the securities offered hereby within the United States or to, or for the account or benefit of, a person resident in the United States.**

**United States Securities Law Compliance**

Concurrently with the filing of this Prospectus with the securities commissions or similar authorities in Canada, the Company has filed a registration statement on Form S-1 with the SEC with respect to the distribution of the Offered Shares which has not yet been declared effective by the SEC. The Offered Shares may not be sold, nor may offers to buy be accepted, in the United States prior to the time the Offered Shares are registered in the United States. See "*Plan of Distribution*".

## RISK FACTORS

*An investment in the securities of the Company involves a high degree of risk and must be considered speculative due to the nature of the Company's business and present stage of exploration and development of its mineral properties. Before making an investment decision, prospective purchasers should carefully consider the risks and uncertainties described below, as well as the other information contained in or incorporated by reference in this Prospectus, including the Annual Report on Form 10-K. These risks and uncertainties are not the only ones facing us. Resource exploration and development is a speculative business, characterized by a number of significant risks including, among other things, unprofitable efforts resulting not only from the failure to discover mineral deposits but also from finding mineral deposits, which, though present, are insufficient in quantity or quality to return a profit from production.*

*Additional risks and uncertainties not presently known to us or that we currently deem immaterial may also impair our business operations. If any such risks actually occur, our business, financial condition and operating results could be materially harmed, the value of our securities could decline and you may lose all or part of your investment. This Prospectus also contains forward-looking statements that involve risks and uncertainties. Our actual results could differ materially from those anticipated in the forward-looking statements as a result of a number of factors, including the risks described below. See "Cautionary Note Regarding Forward-Looking Information".*

**Risks Related to this Offering**

***This is a commercially reasonable "best efforts" offering, there is a minimum amount of securities required to be sold, and we may not raise the amount of capital we believe is required for our business plans, including our near-term business plans.***

The Agents have agreed to use their commercially reasonable best efforts to solicit offers to purchase the securities in this offering. The Agents have no obligation to buy any of the securities from us or to arrange for the purchase or sale of any specific number or dollar amount of the securities. The completion of the Offering is subject to achievement of the Minimum Offering amount and there is no certainty such amount will be achieved. If the Minimum Amount is not achieved, the Company will not receive any proceeds from the Offering, but we will still have to pay the Agents' expenses. Thus, we may not raise the amount of capital we believe is required for our operations in the short-term and may need to raise additional funds, which may not be available or available on terms acceptable to us.

***The Offered Shares are subject to market price volatility.***

The market price of the Offered Shares may be adversely affected by a variety of factors relating to Bunker Hill's business, including fluctuations in the Company's operating and financial results, the results of any public announcements made by Bunker Hill or its joint venture partners and the failure to meet analysts' expectations.

The market price of securities of Bunker Hill has experienced wide fluctuations which may not necessarily be related to the financial condition, operating performance, underlying asset values or prospects of Bunker Hill. Securities of micro-cap and small-cap companies have experienced substantial volatility in the past, often based on factors unrelated to the financial performance or prospects of the companies involved. These factors include macroeconomic developments in North America and globally and market perceptions of the attractiveness of particular industries. This volatility may adversely affect the market price of the Common Shares.

The price of the Common Shares is also likely to be significantly affected by short-term changes in lead, silver, zinc or other mineral prices. Other factors unrelated to the Company's performance that may have an effect on the price of the Common Shares include the following: (i) the extent of analytical coverage available to investors concerning the Company's business may be limited if investment banks with research capabilities do not follow the Common Shares; (ii) lessening in trading volume and

general market interest in the Common Shares may affect an investor's ability to trade significant numbers of Common Shares; (iii) the size of the Company's public float may limit the ability of some institutions to invest in the Common Shares; and (iv) a substantial decline in the price the Common Shares that persists for a significant period of time could cause the Common Shares to be delisted from the CSE or from any other exchange upon which the Common Shares may trade from time to time, further reducing market liquidity.

As a result of any of these factors, the market prices of the Company's Common Shares at any given point in time may not accurately reflect the Company's long-term value. Securities class action litigation often has been brought against companies following periods of volatility in the market price of their securities. The Company may in the future be the target of similar litigation. Securities litigation could result in substantial costs and damages and divert management's attention and resources.

***Discretion in the use of proceeds.***

Bunker Hill currently intends to apply the net proceeds received from the Offering as described above under the heading "*Use of Proceeds*". However, management of the Company will have discretion concerning the use of the net proceeds of the Offering as well as the timing of their expenditures. As a result, an investor will be relying on the judgment of management for the application of the net proceeds of the Offering and will not have the opportunity, as part of the investment decision, to assess whether the proceeds are being used appropriately. Management may use the net proceeds of the Offering in ways that an investor may not consider desirable. The results and the effectiveness of the application of proceeds are uncertain. If the proceeds are not applied effectively, the Company's results may suffer. The failure by management of the Company to apply the net proceeds of the Offering effectively could result in financial losses that could have a material adverse effect on the Company's business.

**Risks and Other Considerations Related to the Company**

***The Company's ability to operate as a going concern is in doubt.***

The audit opinion and notes that accompany the Company's Annual Financial Statements, and the notes that accompany the Company's Interim Financial Statements, disclose a going concern qualification to its ability to continue in business. The Financial Statements have been prepared under the assumption that the Company will continue as a going concern. The Company is an exploration and development stage company and has incurred losses since its inception. The Company has incurred losses resulting in an accumulated deficit of $59,626,902 as of September 30, 2022 and further losses are anticipated in the development of its business.

The Company currently has no historical recurring source of revenue and its ability to continue as a going concern is dependent on its ability to raise capital to fund its future exploration and working capital requirements or its ability to profitably execute its business plan. The Company's plans for the long-term return to and continuation as a going concern include financing its future operations through sales of its Common Shares and/or debt and the eventual profitable exploitation of the Bunker Hill Mine. Additionally, the volatility in capital markets and general economic conditions in Canada, the U.S. and elsewhere can pose significant challenges to raising the required funds. These factors raise substantial doubt about the Company's ability to continue as a going concern.

The Company's Financial Statements do not give effect to any adjustments required to realize its assets and discharge its liabilities in other than the normal course of business and at amounts different from those reflected in the Financial Statements.

***The Company will require significant additional capital to fund its business plan.***

The Company will be required to expend significant funds to determine whether proven and probable mineral reserves exist at its properties, to continue exploration and, if warranted, to develop its existing properties, and to identify and acquire additional properties to diversify its property portfolio. The Company anticipates that it will be required to make substantial capital expenditures for the continued exploration and, if warranted, development of the Bunker Hill Mine. The Company has spent and will be required to continue to expend significant amounts of capital for drilling, geological, and geochemical analysis, assaying, and feasibility studies with regard to the results of its exploration at the Bunker Hill Mine. The Company may not benefit from some of these investments if it is unable to identify commercially exploitable mineral reserves.

Neither the Company nor any of the directors of the Company nor any other party can provide any guarantee or assurance, that the Company will be able to raise sufficient capital to satisfy the Company's short-term obligations. The Company does not have sufficient funds to satisfy its short-term financial obligations. As at September 30, 2022, the Company has $103,833 in cash and total current liabilities of $11,439,038 and total liabilities of $48,321,757. If the Company cannot raise additional capital, the

Company will be in breach of its debt obligations, including under the Royalty Convertible Debenture and all other outstanding convertible debentures of the Company. Further, pursuant to the terms of the Company's agreement with EPA, the Company is required to make certain payments to the EPA in the amount of $17,000,000 for cost recovery. If the Company is unable to raise sufficient capital, the Company may be unable to pay the cost of recovery resulting in a breach of its obligations and the failure to pay may be considered a default under the terms of the Amended Settlement with the EPA and the amended lease and option agreement dated November 1, 2019 with Placer Mining.

Neither the Company nor any of the directors of the Company nor any other party can provide any guarantee or assurance that the full $66,000,000 project financing package (the "**Project Financing Package**") will be finalized or close, as the Project Financing Package remains subject to Sprott internal approvals, further technical and other due diligence and satisfactory documentation. Approximately $14,000,000 of the project financing closed in January 2022 and a further $15,000,000 in June 2022, subsequent to the close of the year. If the full Project Financing Package does not close there is no guarantee that capital can be raised on terms favorable to the Company, or at all. Any additional equity funding will dilute existing shareholders.

In support of plans to rapidly restart the Bunker Hill Mine, the Company worked systematically through 2020 and 2021 to delineate mineral resources and conduct various technical studies. Executing this strategy may require securing additional financing, which may include additional indebtedness of $15,000,000 and a cost over-run facility of $13,000,000.

The Company's ability to obtain necessary funding for these purposes, in turn, depends upon a number of factors, including the status of the national and worldwide economy and the price of metals. Capital markets worldwide were adversely affected by substantial losses by financial institutions, caused by investments in asset-backed securities and remnants from those losses continue to impact the ability for the Company to raise capital. The Company may not be successful in obtaining the required financing or, if it can obtain such financing, such financing may not be on terms that are favorable to us.

The Company's inability to access sufficient capital for its operations could have a material adverse effect on its financial condition, results of operations, or prospects. Sales of substantial amounts of securities may have a highly dilutive effect on the Company's ownership or share structure. Sales of a large number of shares of the Company's Common Shares in the public markets, or the potential for such sales, could decrease the trading price of the Common Shares and could impair the Company's ability to raise capital through future sales of Common Shares. The Company has not yet commenced commercial production at any of its properties and, therefore, has not generated positive cash flows to date and has no reasonable prospects of doing so unless successful commercial production can be achieved at the Bunker Hill Mine. The Company expects to continue to incur negative investing and operating cash flows until such time as it enters into successful commercial production. This will require the Company to deploy its working capital to fund such negative cash flow and to seek additional sources of financing. There is no assurance that any such financing sources will be available or sufficient to meet the Company's requirements, or if available, available upon terms acceptable to the Company. There is no assurance that the Company will be able to continue to raise equity capital or to secure additional debt financing, or that the Company will not continue to incur losses.

***Teck may not exercise its option to acquire 100% of zinc and lead concentrate produced in the first five years at the Bunker Hill Mine which could result in less favourable commercial terms for the sale of these concentrates, and could also impact the Company's ability to secure offtake financing. Regardless of actions taken by Teck, there can be no assurance that the Company will be able to secure or close offtake financing, which could have an adverse effect on the Company's financial position.***

Teck may not elect to exercise its option to acquire 100% of zinc and lead concentrate produced in the first five years at the Bunker Hill Mine. If Teck does not elect to exercise such option, the Company may not be able to sell its zinc and lead concentrate to Teck, which could result in difficulties securing alternative commercial arrangements for the sale of concentrate, less favourable commercial terms in the event that alternative commercial arrangements can be secured, and/or higher transportation and other costs. In addition, the Company may not be able to secure or close the Offtake Financing, regardless of whether Teck elects to exercise its option, the terms of any offtake financing might not be favourable to the Company and the Company may incur substantial fees and costs related to such financing. The Company's inability to secure or close the Offtake Financing or arrange suitable alternative offtake financing may have an adverse effect on the Company's operations and financial position.

***Need for future financing.***

The future development of the Company's business will require additional financing or refinancings. There are no assurances that such financing or refinancings will be available, or if available, available upon terms acceptable to the Company. If sufficient capital is not available, the Company may be required to delay the expansion of its business and operations, which could have a material adverse effect on the Company's business, financial condition, prospects or results of operations.

***The Company has a limited operating history on which to base an evaluation of its business and prospects.***

Since its inception, the Company has had no revenue from operations. The Company has no history of producing products from the Bunker Hill Mine. The Bunker Hill Mine is a historic, past producing mine with very little recent exploration work. Advancing the Bunker Hill Mine into the development stage will require significant capital and time, and successful commercial production from the Bunker Hill Mine will be subject to completing feasibility studies, permitting and re-commissioning of the Bunker Hill Mine, constructing processing plants, and other related works and infrastructure. As a result, the Company is subject to all of the risks associated with developing and establishing new mining operations and business enterprises, including:

- completion of feasibility studies to verify reserves and commercial viability, including the ability to find sufficient ore reserves to support a commercial mining operation;
- the timing and cost, which can be considerable, of further exploration, preparing feasibility studies, permitting and construction of infrastructure, mining and processing facilities;
- the availability and costs of drill equipment, exploration personnel, skilled labor, and mining and processing equipment, if required;
- the availability and cost of appropriate smelting and/or refining arrangements, if required;
- compliance with stringent environmental and other governmental approval and permit requirements;
- the availability of funds to finance exploration, development, and construction activities, as warranted;
- potential opposition from non-governmental organizations, local groups or local inhabitants that may delay or prevent development activities;
- potential increases in exploration, construction, and operating costs due to changes in the cost of fuel, power, materials, and supplies; and
- potential shortages of mineral processing, construction, and other facilities related supplies.

The costs, timing, and complexities of exploration, development, and construction activities may be increased by the location of its properties and demand by other mineral exploration and mining companies. It is common in exploration programs to experience unexpected problems and delays during drill programs and, if commenced, development, construction, and mine start-up. In addition, the Company's management and workforce will need to be expanded, and sufficient housing and other support systems for its workforce will have to be established. This could result in delays in the commencement of mineral production and increased costs of production. Accordingly, the Company's activities may not result in profitable mining operations and it may not succeed in establishing mining operations or profitably producing metals at any of its current or future properties, including the Bunker Hill Mine.

***Negative operating cash flow.***

The Company has no history of earnings and has negative cash flow from operating activities since inception. The Company's mineral properties are in the exploration stage and there are no known mineral resources or reserves and the proposed exploration programs on the Company's mineral properties are exploratory in nature. Significant capital investment will be required to achieve commercial production from the Company's existing projects. There is no assurance that any of the Company's mineral properties will generate earnings, operate profitably or provide a return on investment in the future. Accordingly, the Company will be required to obtain additional financing in order to meet its future cash commitments.

***The Company has a history of losses and expects to continue to incur losses in the future.***

The Company has incurred losses since inception, has had negative cash flow from operating activities, and expects to continue to incur losses in the future. The Company has incurred the following losses from operations during each of the following periods:

- $13,291,484 for the nine months ended September 30, 2022;
- $18,752,504 for the year ended December 31, 2021;
- $9,454,396 for the transition period ended December 31, 2020; and
- $10,793,823 for the year ended June 30, 2020.

The Company expects to continue to incur losses unless and until such time as the Bunker Hill Mine enters into commercial production and generates sufficient revenues to fund continuing operations. The Company recognizes that if it is unable to generate significant revenues from mining operations and dispositions of its properties, the Company will not be able to earn profits or continue operations. At this early stage of its operation, the Company also expects to face the risks, uncertainties, expenses, and difficulties frequently encountered by smaller reporting companies. The Company cannot be sure that it will be

successful in addressing these risks and uncertainties and its failure to do so could have a materially adverse effect on its financial condition.

***The nature of mineral exploration and production activities involves a high degree of risk and the possibility of uninsured losses.***

Exploration for and the production of minerals is highly speculative and involves much greater risk than many other businesses. Most exploration programs do not result in the discovery of mineralization, and any mineralization discovered may not be of sufficient quantity or quality to be profitably mined. The Company's operations are, and any future development or mining operations the Company may conduct will be, subject to all of the operating hazards and risks normally incidental to exploring for and development of mineral properties, including, but not limited to:

- economically insufficient mineralized material;
- fluctuation in production costs that make mining uneconomical;
- labor disputes;
- unanticipated variations in grade and other geologic problems;
- environmental hazards;
- water conditions;
- difficult surface or underground conditions;
- industrial accidents;
- metallurgic and other processing problems;
- mechanical and equipment performance problems;
- failure of dams, stockpiles, wastewater transportation systems, or impoundments;
- unusual or unexpected rock formations; and
- personal injury, fire, flooding, cave-ins and landslides.

Any of these risks can materially and adversely affect, among other things, the development of properties, production quantities and rates, costs and expenditures, potential revenues, and production dates. If the Company determines that capitalized costs associated with any of its mineral interests are not likely to be recovered, the Company would incur a write-down of its investment in these interests. All of these factors may result in losses in relation to amounts spent that are not recoverable, or that result in additional expenses.

***Title to the Company's properties may be subject to other claims that could affect its property rights and claims.***

There are risks that title to the Company's properties may be challenged or impugned. The Bunker Hill Mine is located in Northern Idaho and may be subject to prior unrecorded agreements or transfers and title may be affected by undetected defects.

***The Company may be unable to secure surface access or purchase required surface rights.***

Although the Company obtains the rights to some or all of the minerals in the ground subject to the mineral tenures that the Company acquires, or has the right to acquire, in some cases the Company may not acquire any rights to, or ownership of, the surface to the areas covered by such mineral tenures. In such cases, applicable mining laws usually provide for rights of access to the surface for the purpose of carrying on mining activities; however, the enforcement of such rights through the courts can be costly and time consuming. It is necessary to negotiate surface access or to purchase the surface rights if long-term access is required. There can be no guarantee that, despite having the right at law to access the surface and carry on mining activities, the Company will be able to negotiate satisfactory agreements with any such existing landowners/occupiers for such access or purchase of such surface rights, and therefore the Company may be unable to carry out planned mining activities. In addition, in circumstances where such access is denied, or no agreement can be reached, the Company may need to rely on the assistance of local officials or the courts in such jurisdiction, the outcomes of which cannot be predicted with any certainty. The Company's inability to secure surface access or purchase required surface rights could materially and adversely affect its timing, cost, or overall ability to develop any mineral deposits the Company may locate.

***The Company's properties and operations may be subject to litigation or other claims.***

From time to time the Company's properties or operations may be subject to disputes that may result in litigation or other legal claims. The Company may be required to take countermeasures or defend against these claims, which will divert resources and management time from operations. The costs of these claims or adverse filings may have a material effect on its business and results of operations.

***The Company is subject to significant governmental regulations that affect its operations and costs of conducting its business and may not be able to obtain all required permits and licenses to place its properties into production.***

The Company's current and future operations, including exploration and, if warranted, development of the Bunker Hill Mine, do and will require permits from governmental authorities and will be governed by laws and regulations, including:

- laws and regulations governing mineral concession acquisition, prospecting, development, mining, and production;
- laws and regulations related to exports, taxes, and fees;
- labor standards and regulations related to occupational health and mine safety; and
- environmental standards and regulations related to waste disposal, toxic substances, land use reclamation, and environmental protection.

Companies engaged in exploration activities often experience increased costs and delays in production and other schedules as a result of the need to comply with applicable laws, regulations, and permits. Failure to comply with applicable laws, regulations, and permits may result in enforcement actions, including the forfeiture of mineral claims or other mineral tenures, orders issued by regulatory or judicial authorities requiring operations to cease or be curtailed, and may include corrective measures requiring capital expenditures, installation of additional equipment, or costly remedial actions. The Company cannot predict if all permits that it may require for continued exploration, development, or construction of mining facilities and conduct of mining operations will be obtainable on reasonable terms, if at all. Costs related to applying for and obtaining permits and licenses may be prohibitive and could delay its planned exploration and development activities. The Company may be required to compensate those suffering loss or damage by reason of the mineral exploration or its mining activities, if any, and may have civil or criminal fines or penalties imposed for violations of, or its failure to comply with, such laws, regulations, and permits.

Existing and possible future laws, regulations, and permits governing operations and activities of exploration companies, or more stringent implementation of such laws, regulations and permits, could have a material adverse impact on the Company's business and cause increases in capital expenditures or require abandonment or delays in exploration. The Bunker Hill Mine is located in Northern Idaho and has numerous clearly defined regulations with respect to permitting mines, which could potentially impact the total time to market for the project.

***The Company's activities are subject to environmental laws and regulations that may increase its costs of doing business and restrict its operations.***

Both mineral exploration and extraction require permits from various federal, state, and local governmental authorities and are governed by laws and regulations, including those with respect to prospecting, mine development, mineral production, transport, export, taxation, labor standards, occupational health, waste disposal, toxic substances, land use, environmental protection, mine safety and other matters. There can be no assurance that the Company will be able to obtain or maintain any of the permits required for the exploration of the mineral properties or for the construction and operation of the Bunker Hill Mine at economically viable costs. If the Company cannot accomplish these objectives, its business could fail. The Company believes that it is in compliance with all material laws and regulations that currently apply to its activities but there can be no assurance that the Company can continue to remain in compliance. Current laws and regulations could be amended, and the Company might not be able to comply with them, as amended. Further, there can be no assurance that the Company will be able to obtain or maintain all permits necessary for its future operations, or that it will be able to obtain them on reasonable terms. To the extent such approvals are required and are not obtained, the Company may be delayed or prohibited from proceeding with planned exploration or development of the mineral properties.

The Company's activities are subject to extensive laws and regulations governing environment protection. The Company is also subject to various reclamation related conditions. Although the Company closely follows and believes it is operating in compliance with all applicable environmental regulations, there can be no assurance that all future requirements will be obtainable on reasonable terms. Failure to comply may result in enforcement actions causing operations to cease or be curtailed and may include corrective measures requiring capital expenditures. Intense lobbying over environmental concerns by non-governmental organizations has caused some governments to cancel or restrict development of mining projects. Current publicized concern over climate change may lead to carbon taxes, requirements for carbon offset purchases or new regulation. The costs or likelihood of such potential issues to the Company cannot be estimated at this time.

The legal framework governing this area is constantly developing, therefore the Company is unable to fully ascertain any future liability that may arise from the implementation of any new laws or regulations, although such laws and regulations are typically strict and may impose severe penalties (financial or otherwise). The proposed activities of the Company, as with any exploration

company, may have an environmental impact which may result in unbudgeted delays, damage, loss and other costs and obligations including, without limitation, rehabilitation and/or compensation. There is also a risk that the Company's operations and financial position may be adversely affected by the actions of environmental groups or any other group or person opposed in general to the Company's activities and, in particular, the proposed exploration and mining by the Company within the state of Idaho and the United States.

Environmental hazards unknown to the Company, which have been caused by previous or existing owners or operators of the Bunker Hill Mine, may exist on the properties in which the Company holds an interest. Many of its properties in which the Company has ownership rights are located within the Coeur d'Alene Mining District, which is currently the site of a Federal Superfund cleanup project. It is possible that environmental cleanup or other environmental restoration procedures could remain to be completed or mandated by law, causing unpredictable and unexpected liabilities to arise.

***Regulations and pending legislation governing issues involving climate change could result in increased operating costs, which could have a material adverse effect on the Company's business.***

A number of governments or governmental bodies have introduced or are contemplating legislative and/or regulatory changes in response to concerns about the potential impact of climate change. Legislation and increased regulation regarding climate change could impose significant costs on the Company, on its future venture partners, if any, and on its suppliers, including costs related to increased energy requirements, capital equipment, environmental monitoring and reporting, and other costs necessary to comply with such regulations. Any adopted future climate change regulations could also negatively impact the Company's ability to compete with companies situated in areas not subject to such limitations. Given the emotional and political significance and uncertainty surrounding the impact of climate change and how it should be dealt with, the Company cannot predict how legislation and regulation will ultimately affect its financial condition, operating performance, and ability to compete. Furthermore, even without such regulation, increased awareness and any adverse publicity in the global marketplace about potential impacts on climate change by the Company or other companies in its industry could harm the Company's reputation. The potential physical impacts of climate change on its operations are highly uncertain, could be particular to the geographic circumstances in areas in which the Company operates and may include changes in rainfall and storm patterns and intensities, water shortages, changing sea levels, and changing temperatures. These impacts may adversely impact the cost, production, and financial performance of the Company's operations.

There are several governmental regulations that materially restrict mineral exploration. The Company will be subject to U.S. federal regulations (environmental) and the laws of the State of Idaho as the Company carries out its exploration program. The Company may be required to obtain additional work permits, post bonds and perform remediation work for any physical disturbance to the land in order to comply with these laws. While the Company's planned exploration program budgets for regulatory compliance, there is a risk that new regulations could increase its costs of doing business and prevent it from carrying out its exploration program.

***Land reclamation requirements for the Company's properties may be burdensome and expensive.***

Although variable depending on location and the governing authority, land reclamation requirements are generally imposed on mineral exploration companies (as well as companies with mining operations) in order to minimize long term effects of land disturbance.

Reclamation may include requirements to:

- control dispersion of potentially deleterious effluents;
- treat ground and surface water to drinking water standards; and
- reasonably re-establish pre-disturbance landforms and vegetation.

In order to carry out reclamation obligations imposed on the Company in connection with its potential development activities, the Company must allocate financial resources that might otherwise be spent on further exploration and development programs. The Company plans to set up a provision for its reclamation obligations on its properties, as appropriate, but this provision may not be adequate. If the Company is required to carry out unanticipated reclamation work, its financial position could be adversely affected.

***Epidemics, pandemics or other public health crises, including COVID-19, could adversely affect the Company's business.***

The Company's operations could be significantly adversely affected by the effects of a widespread outbreak of epidemics, pandemics or other health crises, including the outbreak of respiratory illness caused by COVID-19, which was declared a pandemic by the World Health Organization on March 12, 2020. The Company cannot accurately predict the impact that the ongoing COVID-19 pandemic will have on its operations and the ability of others to meet their obligations with the Company, including uncertainties relating to the ultimate geographic spread of the virus, the severity of the disease, the duration of the outbreak, and the length of travel and quarantine restrictions imposed by governments of affected countries. In addition, a significant outbreak of contagious diseases in the human population could result in a widespread health crisis that could adversely affect the economies and financial markets of many countries, resulting in an economic downturn that could further affect the Company's operations and ability to finance its operations.

***Social and environmental activism may have an adverse effect on the reputation and financial condition of the Company or its relationship with the communities in which it operates.***

There is an increasing level of public concern relating to the effects of mining on the nature landscape, in communities and on the environment. Certain non-governmental organizations, public interest groups and reporting organizations ("**NGOs**") who oppose resource development can be vocal critics of the mining industry. In addition, there have been many instances in which local community groups have opposed resource extraction activities, which have resulted in disruption and delays to the relevant operation. While the Company seeks to operate in a socially responsible manner and believes it has good relationships with local communities in the regions in which it operates, NGOs or local community organizations could direct adverse publicity against and/or disrupt the operations of the Company in respect to one or more of its properties, regardless of its successful compliance with social and environmental best practices, due to political factors, activities of unrelated third parties on lands in which the Company has an interest or the Company's operations specifically. Any such actions and the resulting media coverage could have an adverse effect on the reputation and financial condition of the Company or its relationships with the communities in which it operates, which could have a material adverse effect on the Company's business, financial condition, results of operations, cash flows or prospects.

***Potential dilution.***

Future sales or issuances of equity securities could decrease the value of the Common Shares, dilute shareholders' voting power and reduce future potential earnings per Common Share. In order to further expand the Company's operations and meet its objectives, any additional growth and/or expanded exploration activity will likely need to be financed through sale of and issuance of additional Common Shares, including, but not limited to, raising funds to explore the Bunker Hill Mine. The Company will also in the future grant to some or all of its directors, officers, and key employees and/or consultants options to purchase Common Shares as non-cash incentives. The issuance of any equity securities could, and the issuance of any additional Common Shares will, cause the Company's existing shareholders to experience dilution of their ownership interests.

If the Company issues additional Common Shares or decides to enter into joint ventures with other parties in order to raise financing through the sale of equity securities, investors' interests in the Company will be diluted and investors may suffer dilution in their net book value per share of Common Shares depending on the price at which such securities are sold. The Company cannot predict the size of future sales and issuances of equity securities or the effect, if any, that future sales and issuances of equity securities will have on the market price of the Common Shares. Sales or issuances of a substantial number of equity securities, or the perception that such sales could occur, may adversely affect prevailing market prices for Common Shares. With any additional sale or issuance of equity securities, investors will suffer dilution of their voting power and may experience dilution in earnings per share.

Except as described under the heading "*Plan of Distribution*", we may issue additional Common Shares in subsequent offerings (including through the sale of securities convertible into or exchangeable for Common Shares) and on the exercise of share options or warrants.

***The Company's Common Share price may be volatile and as a result an investor could lose all or part of their investment.***

In addition to volatility associated with equity securities in general, the value of an investor's investment could decline due to the impact of any of the following factors upon the market price of the Common Shares:

- disappointing results from the Company's exploration efforts;
- decline in demand for its Common Shares;
- downward revisions in securities analysts' estimates or changes in general market conditions;
- technological innovations by competitors or in competing technologies;

- investor perception of the Company's industry or its prospects; and
- general economic trends.

The Company's Common Share price on the CSE has experienced significant price and volume fluctuations. Stock markets in general have experienced extreme price and volume fluctuations, and the market prices of securities have been highly volatile. These fluctuations are often unrelated to operating performance and may adversely affect the market price of the Common Shares. As a result, an investor may be unable to sell any Common Shares such investor acquires at a desired price.

***The issuance of additional shares of Common Shares may negatively impact the trading price of the Company's securities.***

The Company has issued Common Shares in the past and will continue to issue Common Shares to finance its activities in the future. In addition, newly issued or outstanding options, warrants, and broker warrants to purchase Common Shares may be exercised, resulting in the issuance of additional Common Shares. Any such issuance of additional Common Shares would result in dilution to the Company's shareholders, and even the perception that such an issuance may occur could have a negative impact on the trading price of the Common Shares.

***The Common Shares could be influenced by research and reports that industry or securities analyst may be published.***

The trading market for the Common Shares could be influenced by research and reports that industry and/or securities analysts may publish about the Company, its business, the market or its competitors. The Company does not have any control over these analysts and cannot assure that such analysts will cover the Company or provide favorable coverage. If any of the analysts who may cover the Company's business change their recommendation regarding the Company's stock adversely, or provide more favorable relative recommendations about its competitors, the stock price would likely decline. If any analysts who may cover the Company's business were to cease coverage or fail to regularly publish reports on the Company, it could lose visibility in the financial markets, which in turn could cause the stock price or trading volume to decline.

***The Company has never paid, and does not currently anticipate paying, dividends.***

The Company has paid no dividends on the Common Shares since incorporation and does not anticipate paying dividends in the immediate future. The payment of future dividends, if any, will be reviewed periodically by the board of directors of the Company and will depend upon, among other things, conditions then existing including earnings, financial conditions, cash on hand, financial requirements to fund its commercial activities, development and growth, and other factors that the board of directors may consider appropriate in the circumstances.

***The Russia/Ukraine crisis, including the impact of sanctions or retributions thereto, could adversely affect the Company's business.***

The Company's operations could be adversely affected by the effects of the escalating Russia/Ukraine crisis and the effects of sanctions imposed against Russia or that country's retributions against those sanctions, embargos or further-reaching impacts upon energy prices, food prices and market disruptions. The Company cannot accurately predict the impact the crisis will have on its operations and the ability of contractors to meet their obligations with the Company, including uncertainties relating the severity of its effects, the duration of the conflict, and the length and magnitude of energy bans, embargos and restrictions imposed by governments. In addition, the crisis could adversely affect the economies and financial markets of Canada and the United States in general, resulting in an economic downturn that could further affect the Company's operations and ability to finance its operations. Additionally, the Company cannot predict changes in precious metals pricing or changes in commodities pricing which may alternately affect the Company either positively or negatively.

***Commodity price volatility could have dramatic effects on the results of operations and the Company's ability to execute its business plan.***

The price of commodities varies on a daily basis. The Company's future revenues, if any, will likely be derived from the extraction and sale of base and precious metals. The price of those commodities has fluctuated widely, particularly in recent years, and is affected by numerous factors beyond its control including economic and political trends, expectations of inflation, currency exchange fluctuations, interest rates, global and regional consumptive patterns, speculative activities and increased production due to new extraction developments and improved extraction and production methods. The effect of these factors on the price of base and precious metals, and therefore the economic viability of the Company's business, could negatively affect its ability to secure financing or its results of operations.

***Metal prices are highly volatile. If a profitable market for its metals does not exist, the Company may have to cease operations.***

Mineral prices have been highly volatile and are affected by numerous international economic and political factors over which the Company has no control. The Company's long-term success is highly dependent upon the price of silver, as the economic feasibility of any ore body discovered on its current property, or on other properties the Company may acquire in the future, would, in large part, be determined by the prevailing market price of the minerals. If a profitable market does not exist, the Company may have to cease operations.

***There are amounts due and owing under the Company's agreement with the EPA that have not been paid in accordance with the agreed upon payment schedule. In the event that the EPA or Placer Mining assert default under the terms of the agreement or the Amended Agreement, respectively, the Company may lose its ability to exercise its right to purchase the Mine, which would have a material adverse impact on the Company.***

Pursuant to the terms of the Company's agreement with the EPA, the Company is required to make certain payments to the EPA on behalf of Placer Mining in the amount of $20,000,000 for cost recovery.

The Company entered into an amended Settlement Agreement between the Company, Idaho Department of Environmental Quality, US Department of Justice and the EPA. Upon entering the Amended Settlement, the Company became fully compliant with its payment obligations to these parties. The Amended Settlement modifies the payment schedule and payment terms for recovery of historical environmental response costs at Bunker Hill Mine by the EPA. Pursuant to the terms of the Amended Settlement, the Company paid $2,000,000 to the EPA in January 2022. The Company previously made a payment of $1,000,000 to the EPA. An additional $17,000,000 will be paid by the Company to the EPA in annual instalments until November 1, 2029.

Failure to pay could be considered a default under the terms of the Amended Settlement with the EPA.

***Costs charged to the Company by the Idaho Department of Environmental Quality ("IDEQ") for treatment of waste water fluctuate a great deal and are not within the Company's control.***

The Company is billed annually for water treatment activities performed by the IDEQ for the EPA. The water treatment costs that Bunker Hill is billed for are partially related to the EPA's direct cost of treating the water emanating from the Bunker Hill Mine, which are comprised of lime and flocculant usage, electricity consumption, maintenance and repair, labor and some overhead. Rate of discharge of effluent from the Bunker Hill Mine is largely dependent on the level of precipitation within a given year and how close in the calendar year the Company is to the spring run-off. Increases in water infiltrations and gravity flows within the mine generally increase after winter and result in a peak discharge rate in May. Increases in gravity flow and consequently the rate of water discharged by the mine have a highly robust correlation with metal concentrations and consequently metals loads of effluent.

Hydraulic loads (quantities of water per unit of time) and metal loads (quantities of metals per unit of volume of effluent per unit of time) are the two main determinants of cost of water treatment by the EPA in the relationship with the Bunker Hill Mine because greater metal loads consume more lime and more flocculent and more electricity to remove the increased levels of metals and make the water clean. The scale of the treatment plant is determined by how much total water can be processed (hydraulic load) at any one point in time. This determines how much labor is required to operate the plant and generally determine the amount of overhead required to run the EPA business.

The EPA has completed significant upgrades to the water treatment capabilities of the Central Treatment Plant and is now capable of producing treated water than can meet a much higher discharge standard (which Bunker Hill will be forced to meet beyond May 2023). While it was understood that improved performance capability would increase the cost of operating the plant, it was unclear to EPA, and consequently to Bunker Hill, how much the costs would increase by.

These elements described above, and others, impact the direct costs of water treatment. A significant portion of the total amount invoiced by EPA each year is indirect cost that is determined as a percentage of the direct cost. Each year the indirect costs percentage changes within each region of the EPA. Bunker Hill has no ability to impact the percentage of indirect cost that is set by the EPA regional office. Bunker Hill also has no advanced notice of what the percentage of indirect cost will be until it receives its invoice in June of the year following the billing period. The Company remains unable to estimate EPA billings to a high degree of accuracy.

***The Company's production, development plans and cost estimates in the Technical Report may vary and/or not be achieved.***

The Technical Report is preliminary in nature and will include inferred mineral resources that are considered too speculative geologically to have the economic considerations applied to them that would enable them to be categorized as mineral reserves. Consequently, there is no certainty that the Technical Report will be realized. The decision to implement the Bunker Hill Mine restart scenario to be included in the Technical Report will not be based on a feasibility study of mineral reserves demonstrating economic and technical viability, and therefore there is increased risk that the Technical Report results will not be realized. If the Company is unable to achieve the results in the Technical Report, it may have a material negative impact on the Company and its capital investment to implement the restart scenario may be lost (including changes to the taxation regime) or regulations imposed by governmental or regulatory authorities, including permitting and environmental regulations, or other changes in the regulatory environments. Failure to achieve estimates or material increases in costs could have a material adverse impact on the Company's future cash flows, profitability, results of operations and financial condition.

***There is no certainty that the project development timeline for the Bunker Hill Mine will be realized.***

The Company's planned development timeline for the Bunker Hill Mine is dependent on full project funding, including the advance of $37 million from Sprott pursuant to the Stream Agreement by early 2023. The advance of the Stream Agreement is at the discretion of Sprott. The Company will not be able to conduct these plans if it is not able to secure the advance of the Stream Agreement from Sprott by early 2023 or other forms of financing.

***The Company's exploration activities may not be commercially successful, which could lead the Company to abandon its plans to develop the Bunker Hill Mine and its investments in exploration.***

The Company's long-term success depends on its ability to identify mineral deposits on the Bunker Hill Mine and other properties the Company may acquire, if any, that the Company can then develop into commercially viable mining operations. Mineral exploration is highly speculative in nature, involves many risks, and is frequently non-productive. These risks include unusual or unexpected geologic formations, and the inability to obtain suitable or adequate machinery, equipment, or labor. The success of commodity exploration is determined in part by the following factors:

- the identification of potential mineralization based on surficial analysis;
- availability of government-granted exploration permits;
- the quality of its management and its geological and technical expertise; and
- the capital available for exploration and development work.

Substantial expenditures are required to establish proven and probable reserves through drilling and analysis, to develop metallurgical processes to extract metal, and to develop the mining and processing facilities and infrastructure at any site chosen for mining. Whether a mineral deposit will be commercially viable depends on a number of factors that include, without limitation, the particular attributes of the deposit, such as size, grade, and proximity to infrastructure; commodity prices, which can fluctuate widely; and government regulations, including, without limitation, regulations relating to prices, taxes, royalties, land tenure, land use, importing and exporting of minerals, and environmental protection. The Company may invest significant capital and resources in exploration activities and may abandon such investments if the Company is unable to identify commercially exploitable mineral reserves. The decision to abandon a project may have an adverse effect on the market value of the Company's securities and the ability to raise future financing.

***Estimates of mineralized material and resources are subject to evaluation uncertainties that could result in project failure.***

The Company's exploration and future mining operations, if any, are and would be faced with risks associated with being able to accurately predict the quantity and quality of mineralized material, resources or reserves within the earth using statistical sampling techniques. Estimates of any mineralized material, resources or reserves in the Bunker Hill Mine would be made using samples obtained from appropriately placed trenches, test pits, underground workings, and intelligently designed drilling. There is an inherent variability of assays between check and duplicate samples taken adjacent to each other and between sampling points that cannot be reasonably eliminated. Additionally, there also may be unknown geologic details that have not been identified or correctly appreciated at the current level of accumulated knowledge about the Bunker Hill Mine. This could result in uncertainties that cannot be reasonably eliminated from the process of estimating mineralized material, resources and reserves. If these estimates were to prove to be unreliable, the Company could implement an exploitation plan that may not lead to commercially viable operations in the future.

As the Company has not commenced actual production, mineralization resource estimates may require adjustments or downward revisions. In addition, the grade of ore ultimately mined, if any, may differ from that indicated by future feasibility studies and

drill results. Minerals recovered in small scale tests may not be duplicated in large scale tests under on site conditions or in production scale.

***The mineral exploration and mining industry is highly competitive.***

The mining industry is intensely competitive in all of its phases. As a result of this competition, some of which is with large established mining companies with substantial capabilities and with greater financial and technical resources than the Company's, the Company may be unable to acquire additional properties, if any, or financing on terms it considers acceptable. The Company also competes with other mining companies in the recruitment and retention of qualified managerial and technical employees. If the Company is unable to successfully compete for qualified employees, its exploration and development programs may be slowed down or suspended. The Company competes with other companies that produce its planned commercial products for capital. If the Company is unable to raise sufficient capital, its exploration and development programs may be jeopardized or it may not be able to acquire, develop, or operate additional mining projects.

The silver industry is highly competitive, and the Company is required to compete with other corporations and business entities, many of which have greater resources than it does. Such corporations and other business entities could outbid the Company for potential projects or produce minerals at lower costs, which would have a negative effect on the Company's operations.

***Mineral exploration and development are subject to extraordinary operating risks. The Company currently insures against these risks on a limited basis. In the event of a cave-in or similar occurrence, the Company's liability may exceed its resources and insurance coverage, which would have an adverse impact on the Company.***

Mineral exploration, development and production involve many risks. The Company's operations will be subject to all the hazards and risks inherent in the exploration for mineral resources and, if the Company discovers a mineral resource in commercially exploitable quantity, its operations could be subject to all of the hazards and risks inherent in the development and production of resources, including liability for pollution, cave-ins or similar hazards against which the Company cannot insure or against which the Company may elect not to insure. Any such event could result in work stoppages and damage to property, including damage to the environment. As of the date hereof, the Company currently maintains commercial general liability insurance and umbrella liability insurance against these operating hazards, in connection with its exploration program. The payment of any liabilities that arise from any such occurrence that would not otherwise be covered under the current insurance policies would have a material adverse impact on the Company.

***Mineral exploration and development are dependent on adequate infrastructure.***

Exploration, development and processing activities depend, to one degree or another, on adequate infrastructure. Reliable roads, bridges, power sources and water supply are important elements of infrastructure, which affect access, capital and operating costs. The lack of availability on acceptable terms or the delay in the availability of any one or more of these items could prevent or delay exploration or development of the Company's mineral properties. If adequate infrastructure is not available in a timely manner, there can be no assurance that the exploration or development of the Company's mineral properties will be commenced or completed on a timely basis, if at all. Furthermore, unusual or infrequent weather phenomena, sabotage, government or other interference in the maintenance or provision of necessary infrastructure could adversely affect its operations.

Exploration operations depend on adequate infrastructure. In particular, reliable power sources, water supply, transportation and surface facilities are necessary to explore and develop mineral projects. Failure to adequately meet these infrastructure requirements or changes in the cost of such requirements could affect the Company's ability to carry out exploration and future development operations and could have a material adverse effect on the Company's business, financial condition, results of operations, cash flows or prospects.

***A shortage of equipment and supplies could adversely affect the Company's ability to operate its business.***

The Company is dependent on various supplies and equipment to carry out its mining exploration and, if warranted, development operations. Any shortage of such supplies, equipment, and parts could have a material adverse effect on the Company's ability to carry out its operations and could therefore limit, or increase the cost of, production.

***The Company may purchase additional mining properties.***

If the Company loses or abandons its interests in its mineral properties, there is no assurance that it will be able to acquire another mineral property of merit or that such an acquisition would be approved by the CSE, OTCQB or any other applicable security

exchanges. There is also no guarantee that the CSE, OTCQB or any other applicable security exchanges, will approve the acquisition of any additional properties by the Company, whether by way of an option or otherwise, should the Company wish to acquire any additional properties.

***The Company is a reporting issuer and reporting requirements under applicable securities laws may increase legal and financial compliance costs.***

The Company is subject to reporting requirements under applicable securities law, the listing requirements of the CSE, the OTCQB, the SEC and other applicable securities rules and regulations. Compliance with these requirements can increase legal and financial compliance costs, make some activities more difficult, time consuming or costly, and increase demand on existing systems and resources. Among other things, the Company is required to file annual, quarterly and current reports with respect to its business and results of operations and maintain effective disclosure controls and procedures and internal controls over financial reporting. In order to maintain and, if required, improve disclosure controls and procedures and internal controls over financial reporting to meet this standard, significant resources and management oversight is required. As a result, management's attention may be diverted from other business concerns, which could harm the Company's business and results of operations. The Company may need to hire additional employees to comply with these requirements in the future, which would increase its costs and expenses.

***The Company is subject to the continued listing criteria of the CSE and the OTCQB, and its failure to satisfy these criteria may result in delisting of its Common Shares from the CSE and the OTCQB.***

The Company's Common Shares are currently listed for trading on the CSE and quoted on the OTCQB. In order to maintain the listing on the CSE and the quotation on the OTCQB or any other securities exchange the Company may trade on, the Company must maintain certain financial and share distribution targets, including maintaining a minimum number of public shareholders. In addition to objective standards, these exchanges may delist the securities of any issuer if, in the exchange's opinion: its financial condition and/or operating results appear unsatisfactory; if it appears that the extent of public distribution or the aggregate market value of the security has become so reduced as to make continued listing inadvisable; if the Company sells or disposes of its principal operating assets or ceases to be an operating company; if the Company fails to comply with the listing requirements; or if any other event occurs or any condition exists which, in their opinion, makes continued listing on the exchange inadvisable.

If the CSE, the OTCQB or any other exchange or quotation service were to delist the Common Shares, investors may face material adverse consequences, including, but not limited to, a lack of trading market for the Common Shares, reduced liquidity, decreased analyst coverage, and/or an inability for the Company to obtain additional financing to fund its operations.

***Joint ventures and other partnerships, including offtake arrangements, may expose the Company to risks.***

The Company may enter into joint ventures, partnership arrangements, or offtake agreements, with other parties in relation to the exploration, development, and production of the properties in which the Company has an interest. Any failure of such other companies to meet their obligations to the Company or to third parties, or any disputes with respect to the parties' respective rights and obligations, could have a material adverse effect on the Company, the development and production at its properties, including the Bunker Hill Mine, and on future joint ventures, if any, or their properties, and therefore could have a material adverse effect on its results of operations, financial performance, cash flows and the price of its Common Shares.

***The Company may experience difficulty attracting and retaining qualified management to meet the needs of its anticipated growth, and the failure to manage its growth effectively could have a material adverse effect on its business and financial condition.***

The success of the Company is currently largely dependent on the performance of its directors and officers. The loss of the services of any of these persons could have a materially adverse effect on the Company's business and prospects. There is no assurance the Company can maintain the services of its directors, officers or other qualified personnel required to operate its business. As the Company's business activity grows, the Company will require additional key financial, administrative and mining personnel as well as additional operations staff. There can be no assurance that these efforts will be successful in attracting, training and retaining qualified personnel as competition for persons with these skill sets increase. If the Company is not successful in attracting, training and retaining qualified personnel, the efficiency of its operations could be impaired, which could have an adverse impact on the Company's operations and financial condition. In addition, the COVID-19 pandemic may cause the Company to have inadequate access to an available skilled workforce and qualified personnel, which could have an adverse impact on the Company's financial performance and financial condition.

The Company is dependent on a relatively small number of key employees, including its Chief Executive Officer and Chief Financial Officer. The loss of any officer could have an adverse effect on the Company. The Company has no life insurance on any individual, and the Company may be unable to hire a suitable replacement for them on favorable terms, should that become necessary.

***The Company may be subject to potential conflicts of interest with its directors and/or officers.***

Certain directors and officers of the Company are or may become associated with other mining and/or mineral exploration and development companies which may give rise to conflicts of interest. Directors who have a material interest in any person who is a party to a material contract or a proposed material contract with the Company are required, subject to certain exceptions, to disclose that interest and generally abstain from voting on any resolution to approve such a contract. In addition, directors and officers are required to act honestly and in good faith with a view to the best interests of the Company. Some of the directors and officers of the Company have either other full-time employment or other business or time restrictions placed on them and accordingly, the Company will not be the only business enterprise of these directors and officers. Further, any failure of the directors or officers of the Company to address these conflicts in an appropriate manner or to allocate opportunities that they become aware of to the Company could have a material adverse effect on the Company's business, financial condition, results of operations, cash flows or prospects.

***The Company's results of operations could be affected by currency fluctuations.***

The Company's properties are currently all located in the U.S. and while most costs associated with these properties are paid in U.S. dollars, a significant amount of its administrative expenses are payable in Canadian dollars. There can be significant swings in the exchange rate between the U.S. dollar and the Canadian dollar. There are no plans at this time to hedge against any exchange rate fluctuations in currencies.

***The Company's operations are dependent on information technology systems that may be subject to network disruptions.***

The Company's operations depend on information technology ("**IT**") systems. These IT systems could be subject to network disruptions caused by a variety of sources, including computer viruses, security breaches and cyber-attacks, as well as disruptions resulting from incidents such as cable cuts, damage to physical plants, natural disasters, terrorism, fire, power loss, vandalism and theft. The Company's operations also depend on the timely maintenance, upgrade and replacement of networks, equipment, IT systems and software, as well as pre-emptive expenses to mitigate the risks of failures. Any of these and other events could result in information system failures, delays and/or increase in capital expenses. The failure of information systems or a component of information systems could, depending on the nature of any such failure, adversely impact the Company's reputation and results of operations.

Although to date the Company has not experienced any material losses relating to cyber-attacks or other information security breaches, there can be no assurance that the Company will not incur such losses in the future. The Company's risk and exposure to these matters cannot be fully mitigated because of, among other things, the evolving nature of these threats. As a result, cyber security and the continued development and enhancement of controls, processes and practices designed to protect systems, computers, software, data and networks from attack, damage or unauthorized access remain a priority. As cyber threats continue to evolve, the Company may be required to expend additional resources to continue to modify or enhance protective measures or to investigate and remediate any security vulnerabilities.

**General**

Prospective purchasers should carefully consider the risks in the documents incorporated by reference into this Prospectus, including in the Company's Annual Report on Form 10-K under "*Risk Factors*". If any of such or other risks occurs, the Company's business, prospects, financial condition, financial performance and cash flows could be materially adversely impacted. In that case, the applicable securities could decline in value and purchasers could lose all or part of their investment. There is no assurance that any risk management steps taken by the Company will avoid future loss due to the occurrence of such risks or other unforeseen risks.

## AUDITOR, TRANSFER AGENT AND REGISTRAR

The auditor of the Company is MNP LLP, Chartered Professional Accountants, located at 50 Burnhamthorpe Road West, Suite 900, Mississauga, ON, and has advised the Company that it is a public accounting firm registered with the Public Company

Accounting Oversight Board (United States) ("**PCAOB**") and is independent of the Company in accordance with the U.S. federal securities laws and applicable rules and regulations of the SEC and the PCAOB.

The Company's transfer agent and registrar is Capital Transfer Agency ULC located at its principal office in Toronto, Ontario, Canada.

## LEGAL MATTERS

Certain legal matters related to our securities offered by this Prospectus will be passed upon on behalf of Bunker Hill by Blakes, with respect to Canadian law and J.P. Galda & Co. ("**JPG**") with respect to matters of U.S. law and on behalf of the Agents by DLA Canada, with respect to Canadian law, and DLA Piper LLP (US) ("**DLA US**"), with respect to matters of U.S. law. As of the date of this Prospectus, the partners and associates of Blakes as a group beneficially own, directly or indirectly, less than one percent of the outstanding Common Shares, the partners and associates of JPG as a group beneficially own, directly or indirectly, less than one percent of the outstanding Common Shares, the partners and associates of DLA Canada beneficially own, directly or indirectly, less than one percent of the outstanding Common Shares, and the partners and associates of DLA US beneficially own, directly or indirectly, less than one percent of the outstanding Common Shares.

## INTERESTS OF EXPERTS

The technical information relating to the Bunker Hill Mine, included or incorporated by reference in this Prospectus has been derived from the Technical Report co-authored by Scott Wilson, C.P.G., of Resource Development Associates Inc., Robert Todd, P.E., of Minetech USA LLC, and Peter Kondos, Ph.D., of YaKum Consulting Inc., each an independent Qualified Person under NI 43-101, and each members in good standing of their appropriate professional institutions.

To the best of the Company's knowledge, after reasonable inquiry, as of the date hereof, the aforementioned individuals and their respective firms beneficially own, directly or indirectly, in the aggregate, less than one percent of Common Shares or other securities of the Company.

## STATUTORY RIGHTS OF WITHDRAWAL AND RESCISSION

Securities legislation in certain of the provinces of Canada provides purchasers with the right to withdraw from an agreement to purchase securities. This right may be exercised within two business days after receipt or deemed receipt of a prospectus and any amendment. In several of the provinces, the securities legislation further provides a purchaser with remedies for rescission or, in some jurisdictions, revisions of the price or damages if the prospectus and any amendment contains a misrepresentation or is not delivered to the purchaser, provided that the remedies for rescission, revision of the price or damages are exercised by the purchaser within the time limit prescribed by the securities legislation of the purchaser's province. The purchaser should refer to any applicable provisions of the securities legislation of the purchaser's province for the particulars of these rights or consult with a legal adviser.

## CERTIFICATE OF THE COMPANY

Dated: November 21, 2022

This short form prospectus, together with the documents incorporated by reference in this Prospectus, constitutes full, true and plain disclosure of all material facts relating to the securities offered by this Prospectus as required by the securities legislation of each of the provinces of Canada, except Quebec.

| | |
|---|---|
| By: (*signed*) "*Samuel Ash"* | By: (*signed*) "*David Wiens"* |
| Chief Executive Officer | Chief Financial Officer |

ON BEHALF OF THE BOARD OF DIRECTORS

| | |
|---|---|
| By: (*signed*) "*Richard Williams"* | By: (*signed*) "*Pamela Saxton"* |
| Director | Director |

## CERTIFICATE OF THE AGENTS

Dated: November 21, 2022

To the best of our knowledge, information and belief, this short form prospectus, together with the documents incorporated by reference, constitutes full, true and plain disclosure of all material facts relating to the securities offered by this short form prospectus as required by the securities legislation of each of the provinces of Canada, except Quebec.

**ECHELON WEALTH PARTNERS INC.**

By: (*signed*) "*Jason Yeung"*
Managing Director

**LAURENTIAN BANK SECURITIES INC.**

By: (*signed*) "*Joseph Gallucci"*
Managing Director, Head of Investment Banking