801193

Plan — "Silmonac Report."

"favourable tone"

(poss. "Special Delivery" for) 12 copies of report req'd in first instance (GWW letter March 25/77 / rec'd Mar 30. = 5 days.

MARK CONFIDENTIAL

Do record & gain completions only previous to writing a particular section of report.

Letter — a very simple letter of transmittal — w. no excuses, apologies, explanations, etc.

Title Page

Index incl. Figs bound in text

Index Map — over page 1.

Summary & Conclusions — see P. 39 Scranton Rept. see P. 4, J.C.B. April 68.

~~mention experience & capabl. & management~~ (spec.) — note that these perform may be relevant in regard to

Recommended Work — the evidently most appropriate development alternative — (these req'd by B.C.S.C.) Stage I, Stage II, Stage III, etc.

Estimated Costs — for Stage I, Stage II, Stage III, etc.

see 1967 Estim. Costs for X-cutting (etc.) & note that these relate to the recommendation above

Introduction

— State when most recent exam. made and work accomplished on that trip and reasons for so much time spent on map work — State ~~preliminary~~ office work, maps & studies of govt. & private reports & Co. records & summaries ~~directors~~ — ~~concerned with~~ the Silmonac mining project (see p. 6, 1967) etc. — ~~Sources of info.~~ — writer's background experience in Slocan geology, incl. Silmonac. (possibly integrate in chrono order)

— Purpose of current report, ~~details~~ ...

Acknowledgments

→ reference (see pps. 6 & 7, 1967 rept.), P. 3, Feb/72 rept. & partic. G.W.W. letter March 25.

~~References~~ see p. 6, 1967, etc. also mention that much data re current develop. & mining economics kindly furnished by Messrs. G.W.W. and W. Hogg.

Property — see rept. Feb/72

(a) Location & accessibility (P. 9, 1967 report; p. 6, 1966 report)

see last ¶ P. 9, 1967; P. 10, 1967 rept., Feb., 1972, etc.

(b) Claims — Incl. Fig. 2 — property map, Silmonac Mines Ltd. , J.C.B. April/68

Property comprises one near-square block of 65 " " " contiguous C.G. min'l claims, incl. 3 held under lease. Note that hidden claims are shown on Fig 2 — Property Map, as well as those comprising — (1st ¶ P. 6, 1966); also last ¶, P. 9, 1967, etc.

Note main Slocan lode, herein termed the main lode is continuous over the E-W extent of the claim block, note contiguous producers on this structure & end of the district.

~~(d) Services & Supply Facilities, see P. 10, Nov/67.~~ — also major

(c) Topog & Climate (see GWW Nov 19/76, p. 4); Hewitt — Van Horn rept. etc. — and others, ref to G.W.W. Feb 2/77

MINE WORKINGS & GENERAL PLANT — describe mine mill & surf. plant & present mine production & milling capacities & performance

~~History~~ — GWW see Mayo, P4, P17 & P18, ¶'s 1-2, top ¶ 3, P. 19; ¶ 3, P. 33,

mainly ref. to Silmonac w. gen. preamble — see P. 11 of Nov/67, succeeding mgt. & MM repts. — details provided in G.W.W. memos & studies — partic. Nov 19/76, p. 2 etc. and complete with

Current Mining Operations (a) above ¶ 625 level, GWW Nov. 19, pp. 1-2 — see Feb./72 — incl. develop., mining, & exploration — } Caused check particulars via phone call to Bill H. Hogg

Production Record & Parameters — see G.W.W., 1976 to Dec 31, recap. calc of total production by mine & M.H.

(a) Silmonac Mine

Note mine working on the main lode, which is defined as a major zone of transverse bedding deformation, shearing & fracturing — composite nature

(b) Main lode to date via list of all relevant properties — see old

Ton tons, oz. Ag, lbs Pb, lbs Zn, lbs Cd

Tonnages ... rel. to 1977 metal prices.

not too much time on this!

→ GEOLOGY & MINERALIZATION

(A) Regional — Nov/67 & Feb/72, also see Mayo P. 10, ¶2, ¶3 — P. 11, also note limiting elevations of optimum panel over known length of main lode and those within

(B) Main Lode — see Bull 29, Mayo, WMS reports; incl vert. ranges of principal orebodies E-to W w relationships to rock types & structures and main features of lodes & product for each.

~~Silmonac~~ ~~Property~~ (Nov./67 & Feb./72; incl signif. features of Carnation interval, incl. (Mayo) intense alter. surf. in mining ... Read Basin, & min'l in 5480 N & S lodes.

(C) Silmonac Mine — see Feb./72, descriptive part of Interim Report 72-3.

ORE CONTROLS — Keep this to a list, w. min. of explan. text, Bull 29

see also W.S. rept. Sept 11/72 — Ref. M.S. Hedley, note also C.E. Cairnes substantiating data in his Mem. 173, rel. to 'transverse', or 'lode' panels

also distinguish between nature of main lode structures and that of subordinate lodes & veins — noting tendency of ore to occur throughout the 1000-plus vert. range of the principal optimum panel on the main lode vs the tendency of orebodies on rel. subord. lodes and veins to localize at either upper or lower limits of the optimum panel. Note interplay association of main lode with the main transverse bedding panel or 'hinge-line' of buckling strata. (O.T's)

also incorporate GWW's statistical approach, & that imply that

favourable (zone) is essentially conformable with the principal ore-dep. between the Payne - Q.B. west-dipping element of the main Slocan fold. also see Mayo

See also Mayo, P1 + P3. P4 / page 43 P2 / page 45

ORE RESERVES

Definitions.

(a) - Probable or Indicated - Bill H. estim. could be 2000 tons (mo @ present rate)

(b) - * Possible or Potential - can make them as large as we want to, as long as figure is logically derived: Possible via 2 bases: 1st based on lode areas; 2nd based on T/1000' lode length with appropriate discounting factor; 3rd - See below - (1)

See G.W.W. Nov. 19 in part 7/C intervals. P.6 #4; P.13 / P3; Jan 19: P.3 / #4;

EXPLORATION - DEVELOPMENT CONSIDERATIONS

Preliminary - present situation - attempt to outline the more significant parameters affecting the alternative methods below, via the 'list' method.

Alternative Methods, including rough estim. of costs for all except the preferred alternative below;

Preferred Plan (incl rehab + re-equip of 4000 level, and note 2 alternative courses can be followed at inner end. Show a detailed cost estimate for the preferred alternative below: [illegible]

If time (show time and cash schedule & via bar chart) - if time allows

CURRENT PRODUCTION & MARKETING COSTS : G.W.W. & K+K data

(a) Preliminary

(b) Costs at Current Production Rate

(c) Projected Costs @ Higher Production Rates (3000, 3500, 4000 t.p.m)

VALUATION OF CURRENT MINE PRODUCTION & RESERVES

Preliminary (bases for following calcs)

Net Smelter Value, Lead Concentrates Ref to Feb/72 rept, pps 14, 15.

Net Smelter Value, Zinc Concentrates

Net Mine or Millhead Value - Ore Reserves

Derive Ratio of $\frac{\text{tons of ore milled}}{\text{tons of Pb + Zn concentrates}} = \frac{100}{17.71}$

- See Scranton report, Aug. /75 pps 33 - on -

FUTURE METAL PRICE CONSIDERATIONS

General - See E.M.J., G.W.W. etc etc

Expected Short-Term Increases

Expected Long-Term Increases

FUTURE PRODUCTION COST CONSIDERATIONS - to incl. (1) the selected development alternative. (2) Gary estim. +10%/yr ... smelting chgs., ... articles, E.M.J. March /77 G.W.W. studies

NET CASH FLOW PROJECTIONS - based on: Net Production Revenue from ... less Ex. Devel. - mining costs 3500 T/mo

Read G.W.W. Thoroughly N.B. Feb. 2, p. 4

Give definitions rel to the Cash Flow Equation

Estimate net cash flow for a 5-year period.

Net Cash Flow = Cash Inflow - Cash Outflow.

(A) Allow (1 year estim.) for completion of new development program, incl. the driving of sufficient 1800'-2000' of 8' x 10' lateral and stubs to prepare for mining of currently-delin. ore blocks and their dip-extensions:

(B) Estimate net cash flow from 4625-based operations (1600 T/mo) during this period and, if it is positive, accrue it in a general + on-going reserve for pay-back.

(C) Compute net cash-flow from operations from the 4000-base, at increasing annual increments of through-put, to and at 3500 T/mo, over a 5-yr period and put in table-form: From these results (table) length of time to pay back capital cost of the new development program can be ascertained (if time avail. allow for annual cost-price increases.

CERTIFICATE & Letter of Consent,

APPENDICES (on page ahead of pocket)

Sub-head: List of Report Maps (in pocket)

In Introduction, express appreciation of G.W.W.'s provision of tech. data, & rec. ... also for his patience.

Change title to some form of FEASIBILITY REPORT - BASED ON A FACT (S+C) that ore reserves include a substantial and firmly indicated portion rel accessible blocks of ore.