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A REVIEW OF THE
FARO LEAD-ZINC PROPERTY, YUKON TERRITORY
FOR
ANVIL RANGE MINING CORPORATION.

Watts, Griffis and McQuat
Consulting Geologists and Engineers

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Toronto, Ontario
September 28, 1994

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1. SUMMARY

1.1 GENERAL

Watts, Griffis and McOuat Limited (WGM) has been retained by Anvil Range Mining Corporation (Anvil Range) to undertake a review and evaluation of the Faro lead-zinc-silver property and to present the results of the study in a report consistent with the guidelines set by the Canadian Provincial Securities Administrators and outlined in National Policy 2-A.

The Anvil Range lead-zinc-silver district is located approximately 200 air kilometres northeast of Whitehorse, Yukon Territory. It lies east of Rose Mountain and northwest of Mount Mye in the Anvil Range of mountains in the east-central Yukon.

Dynasty Explorations, organized and headed by geological engineer Dr. Aaro E. Aho, discovered the Faro deposit in 1965 following a program of detailed geologic, geochemical, geophysical and prospecting work, extensive airborne geophysical surveys and a major rotary drilling program.

Including Faro, now mined out, five known stratiform sedimentary exhalative deposits occur in a well defined trend within a narrow Cambrian stratigraphic interval. The other deposits include Vangorda, which was discovered by Prospectors Airways in 1953, only reached commercial production in 1990, and now has remaining reserves of about one million tonnes; Grum, a buried deposit which was the subject of a pre-stripping program by the last previous operator, but still requires the removal of a considerable tonnage of waste before it can be mined; Dy, a deep, high-grade deposit which will be mined by underground methods; and Swim, an underground deposit which was discovered in 1963, and is smaller and lower grade than Dy.

Cyprus Mines Corporation (Cyprus Mines) had provided Dynasty with joint venture financing in the wildcat drilling stage of the exploration program which lead to the discovery

of the Faro deposit. **Cyprus Anvil Mining Corporation** (Cyprus Anvil), a joint venture between Cyprus Mines (60%) and Dynasty (40%), was formed December 1, 1965 to bring Faro into production.

Cyprus Anvil operated the property until 1982 when concentrate production was halted because of deteriorating metal prices, at which time 40% of the Faro orebody had been mined.

In 1987, Curragh Inc. was organized by Clifford H. Frame to acquire the assets of a predecessor partnership which in 1985 had acquired certain of the assets of Cyprus Anvil. These assets consisted primarily of the open pit mine and concentrator at Faro, other orebodies on the Vangorda plateau and mineral properties in British Columbia.

Curragh commenced operations at the Faro Division in January 1986 and made its first shipment of concentrates in June, 1986. Reserves in the Faro deposit were finally exhausted in 1992, but by this time Vangorda had been brought into production and pre-stripping had commenced on the Grum deposit.

In April 1993, Curragh ceased operation of the Faro properties and in May 1993 filed for protection under the "Companies' Creditors Arrangement Act". On October 15, 1993, the Ontario Court of Justice (the Court) appointed Peat Marwick Thorne (the Receiver) as Interim Receiver of the Faro properties and ordered that the Receiver conduct marketing of the Faro assets. In June 1994, the Court approved an Agreement of Purchase and Sale of the Faro properties between the Receiver of Curragh Inc. and Anvil Range. Anvil Range now plans to resume operations at the property.

1.2 RESOURCES AND RESERVES

The most recent estimate of resources and reserves in the Faro deposits by Curragh was dated January 1, 1993. In order to confirm these resources and reserves, WGM completed a review and audit of the previous operator's estimates as at January 22, 1993, adjusted for the

tonnages mined in the previous three weeks.

Following the closure of the Faro operations in April, 1993, Curragh issued a revised statement of resources and reserves. They adjusted the January 1 estimate for the tonnages mined from January 1 to the date of the shutdown. In order to confirm these resources and reserves, WGM adjusted the tonnages and grades, and these are summarized in the following Table.

**FARO PROPERTY
SUMMARY OF RESERVES**
(Audited by WGM in January 1993; adjusted in April 1993)

	Tonnes	Zinc (%)	Lead (%)	Zinc + Lead	Silver (g/t)	Gold (g/t)
Proven						
Vangorda Open Pit	1,005,000	4.40	3.60	8.00	46.9	0.92
Stockpiles	<u>2,598,000</u>	<u>2.89</u>	<u>1.96</u>	<u>4.85</u>	<u>17.9</u>	<u>0.19</u>
Subtotal Proven	3,603,000	3.31	2.42	5.73	26.0	0.82
Probable						
Grum [IV Pit (exc. Champ)]	24,760,000	4.54	2.74	7.28	46.0	0.70
Probable						
Dy Underground	<u>9,390,000</u>	<u>6.62</u>	<u>5.50</u>	<u>12.12</u>	<u>80.3</u>	<u>0.82</u>
TOTAL	37,753,000	4.94	3.40	8.34	52.6	0.70

Cutoff grades of 3% combined zinc plus lead for open pit and stockpile reserves and 9% for underground reserves are assumed.

On the basis of its checks of the data, WGM concluded that the quality of the data used in the estimates was excellent and had been appropriately applied by Curragh in completing its

estimates. WGM is of the opinion that the estimates of the previous operator fairly represent the tonnage and grade of the resources and reserves on the Faro property as at the date of this report.

1.3 PLANT AND INFRASTRUCTURE

As part of its due diligence for the preparation of this report, WGM engaged the services of an associate engineer to visit the Faro property in order to:

- assess the current condition of the plant and facilities after having been shut down for a period of approximately 18 months; and
- identify any problems that could affect a resumption of operations.

The scope of the inspection was restricted to the mill site and support facilities, such as the water and electrical power supply to the mill and the tailings pipe line. It must be emphasized that the engineer restricted his inspection to a visual appraisal, and did not attempt to start up any of the machinery.

WGM's engineer concluded that while some cleanup and repairs are necessary, most of the buildings and equipment are in fairly good condition. However, in order to facilitate a successful startup of production, a thorough inspection and servicing of process and ancillary equipment should be undertaken.

This would entail inspection and replacement, as necessary, of all wear components, adjustment to manufacturer's specifications, replacement of all lubricants and testing of all electrical circuits and equipment. All piping systems would require inspection, flushing and pressure testing before being brought on line.

1.4 ENVIRONMENTAL REVIEW

In the course of our due diligence review of the Faro operations in January 1993, we examined the existing permits applicable to the Faro and Vangorda/Grum/Dy areas issued by the Yukon Water Board. These all appeared to be in order and we do not anticipate that Anvil Range will have any difficulties meeting the requirements for renewal.

In an agreement currently under negotiation with the Department of Indian Affairs and Northern Development (DIAND), Anvil Range will agree to create a Reclamation Security Trust (RST), which will fund its environmental closure liabilities. These liabilities comprise decommissioning and reclamation of mining and related activities on the Vangorda and Grum properties as well as the former Faro mine on an ongoing basis. Anvil Range's ongoing environmental management of liabilities from operations prior to the closure of the mines will be funded from operating cash flow.

The RST will be managed apart from the Anvil operation. Together with existing security arrangements under the Water Licences, it will have a maximum contribution limit of \$100 million, inclusive of interest.

The RST will be funded by a net smelter return (NSR) royalty. The rate of the NSR will be determined on a graduated scale based on prevailing zinc prices. It is anticipated that the value of the RST and existing security under the Water Licences will exceed \$100 million at the end of 12 years, based on Anvil Range's current mine plan, WGM's financial projections and an imputed rate of interest of 7%.

1.5 FINANCIAL EVALUATION

WGM used the Discounted Cash Flow (DCF) approach in its evaluation of the Faro project. Although mineable reserves in stockpiles, the Vangorda deposit and the Grum deposit total 37.753 million tonnes, the tonnage mined over the 10-year period covered by the cash flow model totals 32.982 million tonnes. The reason for this is that the cash flow model is

restricted to a 10-year period, at the end of which there is still some 4.58 million tonnes remaining in the Dy deposit.

Capital expenditures and the funds required from completion of project financing to September 30, 1995 have been estimated by Anvil Range at \$75 million. In addition, approximately \$40 million will be required in the years 2000 and 2001 to develop the Dy deposit; and sustaining capital expenditures for equipment replacement over the life of the operation are estimated at \$28 million. Operating costs, exclusive of shipping and reclamation, average \$29.76 per tonne of ore over the 10-year period.

These capital and operating costs were developed by Anvil Range and reviewed by WGM. We believe that they are reasonable estimates.

Financial projections were developed for three cases, as follows:

- Base Case: Zinc prices ranged from US\$0.55 to US\$0.65 per pound.
- Case 2: The zinc price constant at US\$0.60 per pound.
- Case 3: Zinc prices ranged from US\$0.39 to US\$0.77 cents per pound.

Case 3 is based on a forecast of zinc prices and treatment charges for the period 1996-2005 by a leading base metal marketing analyst. We have used these prices and charges in Case 3 to verify the results of the Base Case and Case 2.

In all three cases, the lead price was held at \$US0.28 per pound and the silver price at US\$5.50 per ounce.

Net Present Values (NPVs) of the accumulative net cash flows were calculated at discount rates of 5%, 10% and 15% and are summarized in the following table:

FARO PROPERTY - NET PRESENT VALUE
\$ MILLION

Discount Rate	Case 1	Case 2	Case 3
	Base Zinc Prices US\$0.55 to US\$0.65	Zinc Price Capped at US\$0.60/lb	Varying Zinc Prices Independent Forecast
5%	279.3	255.6	266.5
10%	216.7	201.1	212.6
15%	172.6	162.5	173.4

The impact of zinc price on the NPV at discount rates of 10% and 15%, and the impact of zinc price on the project rate of return are demonstrated by the bar charts following page 7.

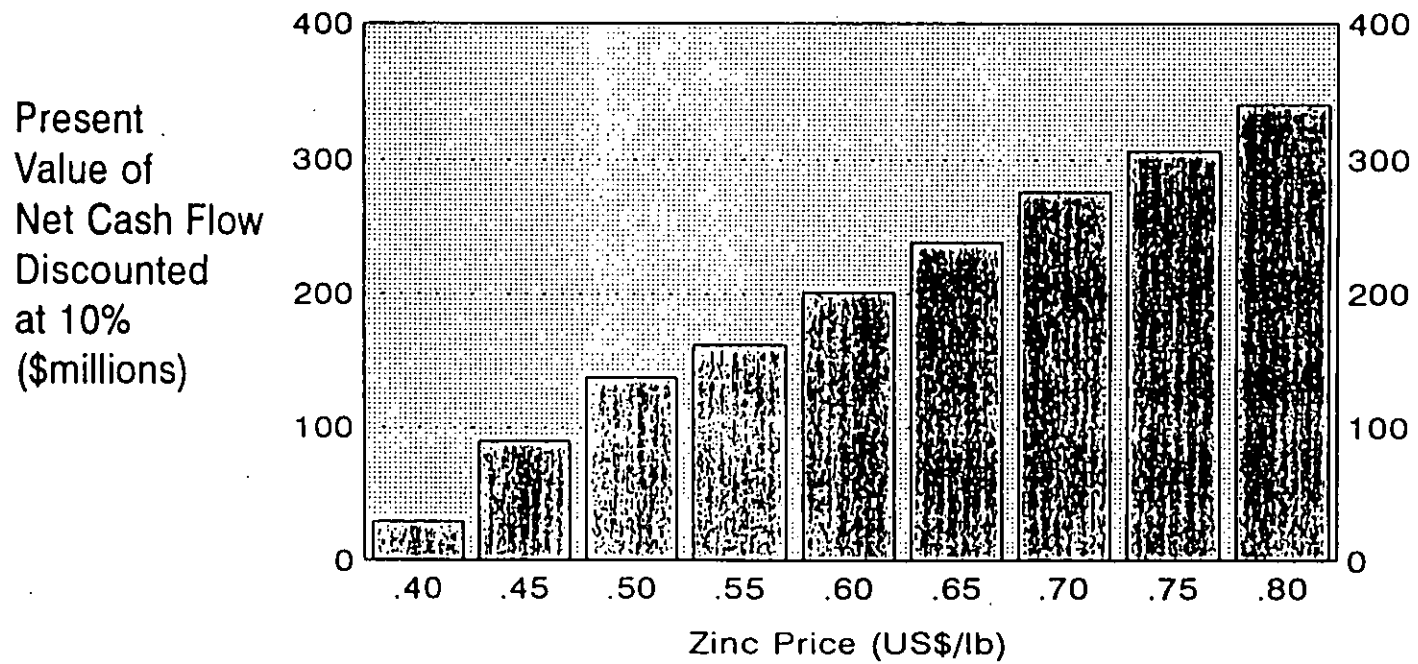
1.6 CONCLUSIONS AND RECOMMENDATIONS

1.6.1 CONCLUSIONS

- Assuming the metal prices used in the base case, i.e. zinc prices of US\$0.55 to US\$0.65 per pound, the Faro operation will provide a positive cash flow, an attractive NPV and an internal rate of return (IRR) of 33%.
- Mothballing and winterizing of the plant equipment and facilities were reasonably well done, and little difficulty should be encountered in rehabilitating the operation.
- Startup of the plant should go smoothly.

Anvil Range Mining Corporation

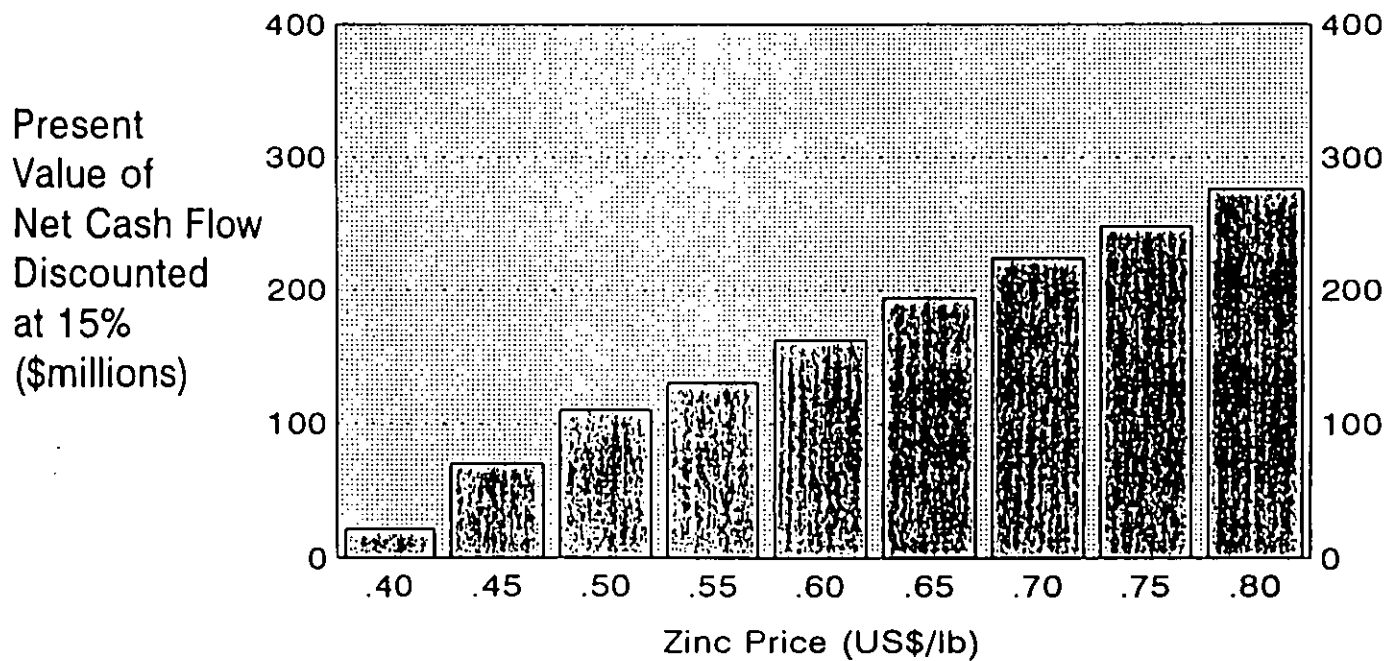
Impact of Zinc Price on the Net Present Value



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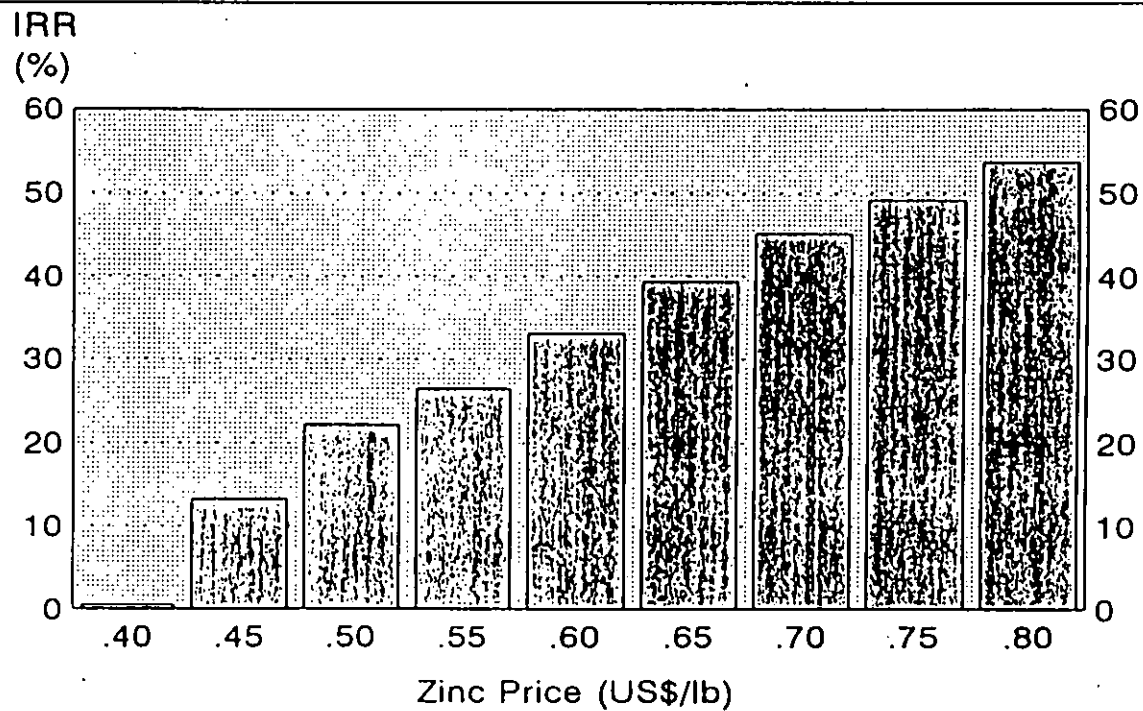
Impact of Zinc Price on the Net Present Value



Sept 28, 1994

Anvil Range Mining Corporation

Impact of Zinc Price on the Project IRR



Sept 28, 1994

1.6.2 RECOMMENDATIONS

- Prior to startup, a thorough cleanup must be carried out of the crushing and process plants.
- The concentrator improvements, including the installation of zinc circuit high intensity conditioning, additional lead regrind mill and centralized process control system must be completed before startup to achieve projected metallurgical results.
- Modifications to the materials handling system in the crushing plant are required to reduce spills.

2. INTRODUCTION

2.1 GENERAL

The Anvil lead-zinc-silver district is located 200 km northeast of Whitehorse, Yukon Territory. Dynasty Explorations (Dynasty), organized and headed by geological engineer Dr. Aaro E. Aho, discovered the Faro deposit in 1965 following a program of detailed geologic, geochemical, geophysical and prospecting work, extensive airborne geophysical surveys and a major rotary drilling program.

Including Faro, five known stratiform sedimentary exhalative deposits occur in a well defined trend within a narrow Cambrian stratigraphic interval. The other deposits include Vangorda, which was discovered by Prospector Airways in 1953, only reached commercial production in 1990, and now has remaining reserves of about one million tonnes; Grum, a buried deposit which was the subject of a pre-stripping program by the last previous operator, but still requires the removal of a considerable tonnage of waste before it can be mined; Dy, a deep, high-grade deposit which is planned to be mined by underground methods; and Swim, an underground deposit which was discovered in 1963, is smaller and lower grade than Dy.

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Cyprus Anvil operated the property until 1982 when concentrate production was halted because of deteriorating metal prices, at which time 40% of the Faro orebody had been mined.

In 1987, Curragh Inc. (Curragh) was organized by Clifford H. Frame to acquire the assets of a predecessor partnership which in 1985 had acquired certain of the assets of Cyprus Anvil. These assets consisted primarily of the open pit mine and concentrator at Faro and other orebodies on the Vangorda plateau and mineral properties in British Columbia.

Curragh recommenced operations at the Faro Division in the spring of 1986 and made its first shipment of concentrates in June, 1986. Reserves in the Faro deposit were finally exhausted in 1992, but by this time Vangorda had been brought into production and pre-stripping had commenced on the Grum deposit.

In April 1993, Curragh was forced into receivership by its creditors, and in June 1994 the Ontario Court of Justice (General Division) Commercial List approved an Agreement of Purchase and Sale between Peat Marwick Thorne, Inc. (the Receiver) as Interim Receiver of Curragh Inc. and Anvil Range Mining Corporation (Anvil Range). Anvil Range now plans to resume operations at the property.

2.2 TERMS OF REFERENCE

Watts, Griffis and McOuat Limited (WGM) were retained by Anvil Range in September 1994 to undertake a review and evaluation of the Faro property and to present the results of this study in a report. The format of the report is consistent with the guidelines set by the Canadian Provincial Securities Administrators and outlined in National Policy 2-A.

2.3 SOURCES OF INFORMATION

A team of WGM senior mineral engineers visited the Faro property during the week of January 24, 1993 as part of a due diligence study of the operations of the Faro Division of Curragh in support of financing being planned at that time. The various team members reviewed the geology and mineralization of each of the deposits in the Faro district, examined ore reserve calculations, inspected surface and plant facilities, and reviewed geological and engineering data, including metallurgical data, available on site. They also held discussions

with management personnel, operating personnel and exploration staff.

During WGM's 1993 study, Curragh provided WGM with a number of technical reports to assist its engineers in completing the study.

In September 1994, a WGM senior associate engineer visited the property for the purpose of assessing the condition of the existing facilities following an 18-month shutdown of the Faro operations. WGM senior engineers have also discussed various technical and financial aspects of the project with senior personnel of Anvil Range.

A complete list of information sources is provided at the end of this report.

2.4 UNITS AND CURRENCY

Metric units are used throughout this report.

An exchange rate of C\$1.00 = US\$0.75 was used when a conversion was required.

Canadian dollars are used in this report unless otherwise indicated.

3. PROPERTY LOCATION AND DESCRIPTION

3.1 PROPERTY LOCATION

The Anvil lead-zinc-silver district is located approximately 200 air miles northeast of Whitehorse, Yukon (Figure 1). It lies east of Rose Mountain and northwest of Mount Mye in the Anvil Range of mountains in the east-central Yukon.

3.2 PROPERTY DESCRIPTION

Five known stratiform sedimentary exhalative deposits occurred in a well defined trend within a narrow Cambrian stratigraphic interval. From northwest to southeast they are Faro, Grum, Vangorda, Dy and Swim. A site plan of the Faro property is shown in Figure 2.

The property consists of 2300 mining claims and 67 mineral leases which form a contiguous land package with a total area of 41,500 hectares. In 1993, WGM was provided with a document generated from a land database maintained at that time at Curragh's Whitehorse office, which contains listings of the various types of land holdings in each area, the name and number of each unit, the recorded owner (certain claims in the Anvil district are owned by others or have beneficial interests held by others), and the expiry date. The document also contains claim maps of each area, with the expiry dates of the various units identified by colour coding.

WGM has reviewed this document, but has not independently verified title to any of the property.

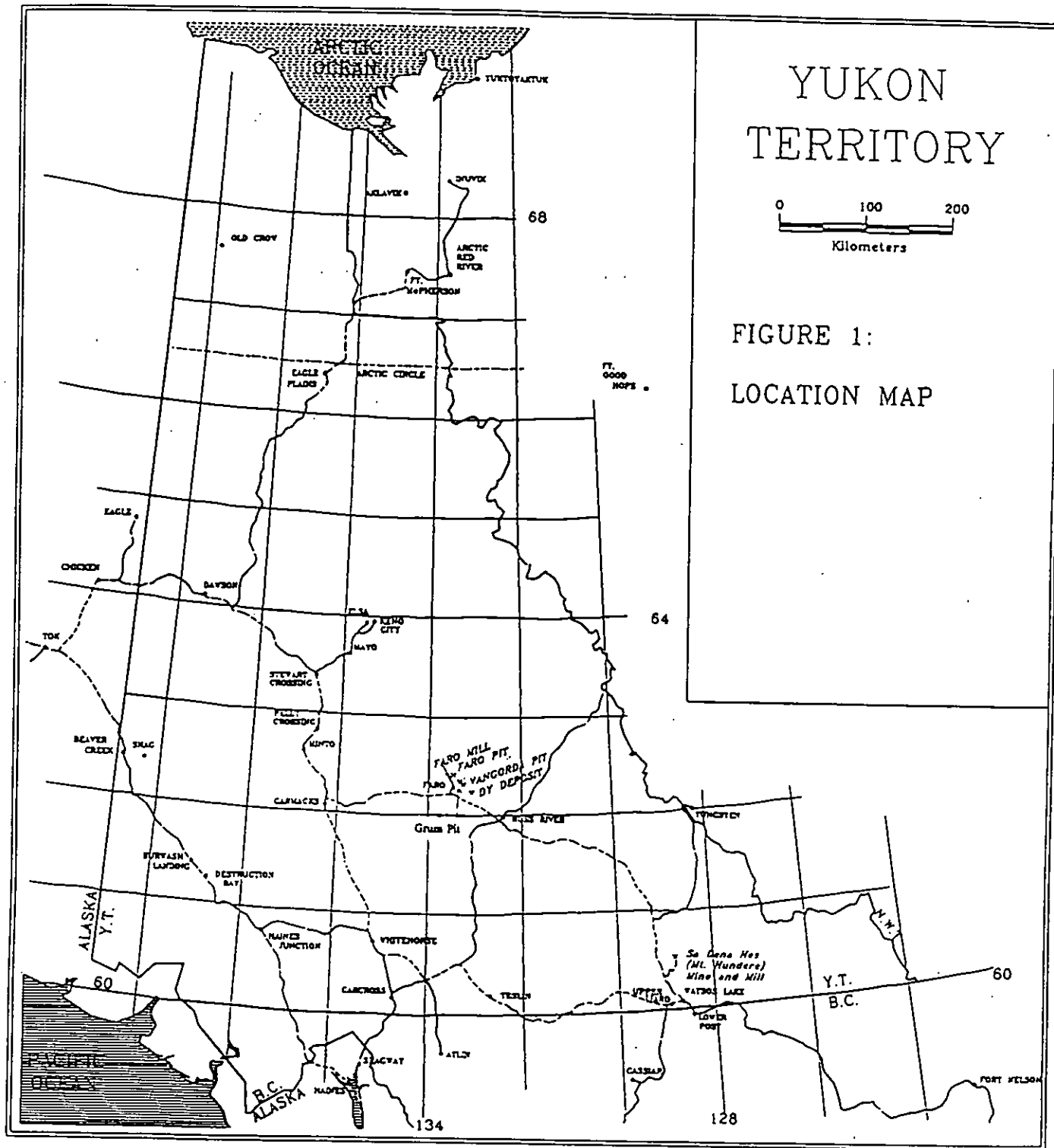


Figure 1. Anvil Range Mining Corp. Location Map - Faro Property

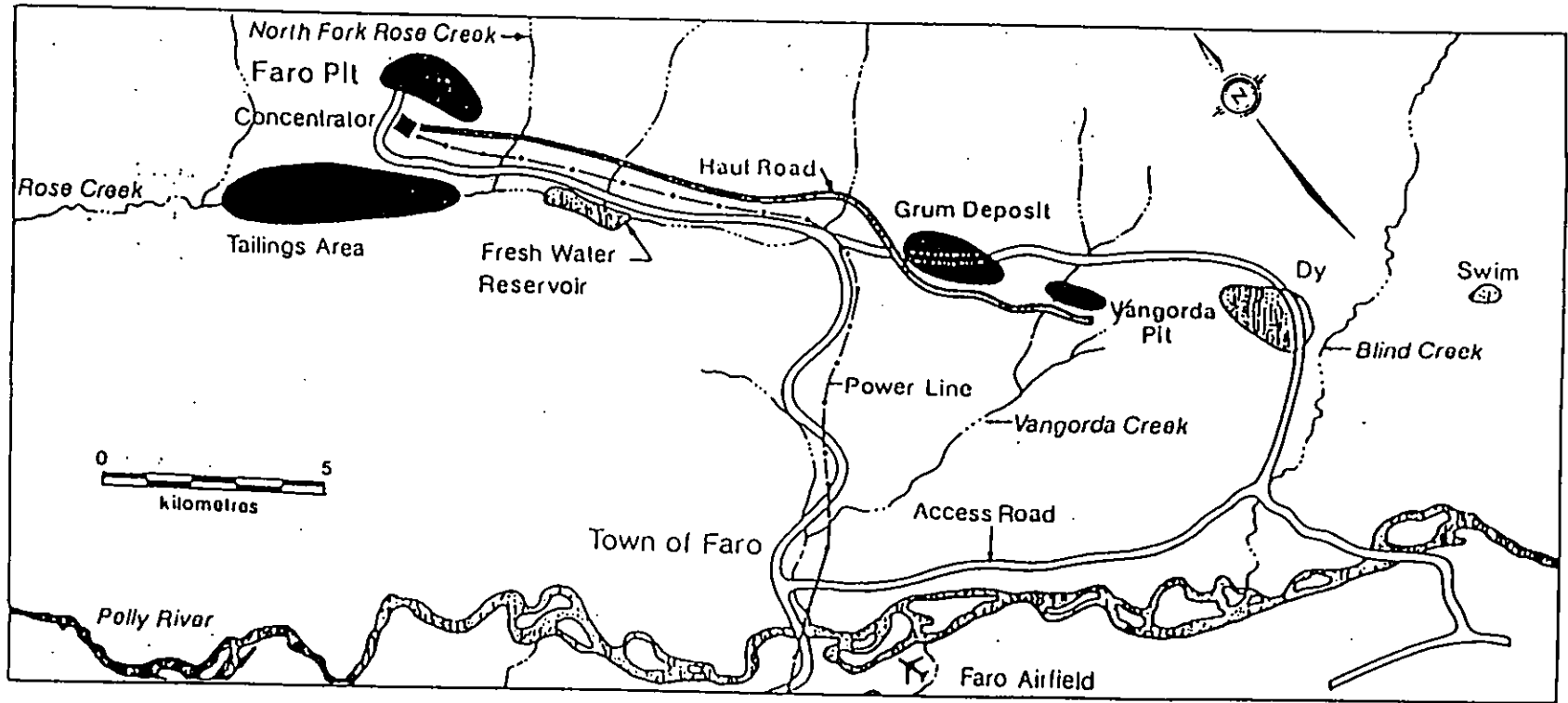


Figure 2. Site plan - Faro operations.

4. ACCESS, CLIMATE AND LOCAL RESOURCES

4.1 ACCESS

The Faro property is about 335 km by road from Whitehorse via Highway 2 northward about 160 km to Carmacks, then east for about 175 km to the mine access road. Faro is about 28 km from the highway. The access is a sealed road and includes a double span, 16 m long bridge across the Pelly River.

The distance from the Faro mine to the ore terminal at the Port of Skagway, Alaska, is about 500 km, and from Whitehorse to Skagway about 165 km.

Faro has a 915 m all-weather gravel airstrip which was built by the Department of Transport in 1972 and is equipped with lights and navigational aids. When the mine was in production, regularly scheduled flights were provided by a licensed carrier twice daily to Whitehorse.

4.2 CLIMATE

Faro is about 465 km south of the Arctic Circle and about 27° from the North Pole. However, a great deal of protection is afforded by mountain ranges on three sides of the site, consequently, the extreme cold experienced elsewhere in the Yukon in winter is tempered somewhat.

Precipitation ranges from 22 to 33 cm per year. Snow can be expected any time after mid-October and accounts for 50% of the annual precipitation. The maximum snowfall cover ranges up to 120 cm in late March.

Temperature at the minesite range from a low of 45°C to 50°C for short periods in mid-winter to a maximum of 30°C in the summer. Freezing conditions persist from mid-September to early May.

4.3 LOCAL RESOURCES

Prior to the closure of the Faro operations in April 1993, Curragh employees were housed in the town of Faro, 19 km from the minesite. At that time, it was the second largest community in the Yukon, and at the end of 1991 had a population of 1,221 according to Census Canada.

Faro is incorporated with Town status under the provisions of the Yukon Territorial Ordinance. It is run by an elected council consisting of a Mayor and four Aldermen.

Facilities existing at the time of the closure included a recreation centre; nursing station operated by the Northern Health Service; a school for grades 1 to 12 provided by the Territorial Government; several hotels and restaurants; shopping centre; post office; and an ice hockey/skating arena.

Minesite water is pumped from the north fork of Rose Creek from an impounding area through a surface pipeline. The line is 1,825 m long and 60 cm in diameter. During periods of low surface runoff, a storage reservoir which is fed by the south fork of Rose creek is used to control water supply. This reservoir has a capacity of 900 million gallons.

Water for the town of Faro is supplied from two wells drilled approximately 90 m from the Pelly River. The wells are 25 cm in diameter and 17 m deep. Water enters the town distribution lines at a temperature of 3°F. During the winter season, the water must be heated at the entry point.

Power for both the Faro townsite and the minesite is available from Yukon Electric, principally from the Whitehorse Rapids generating plant via a 425 km, 138 KV power line. A five megawatt emergency and peak load plant at Faro also contributes to the system.

5. HISTORY

Occurrences of lead-zinc mineralization in the Vangorda district about 14 km southeast of the Faro deposit were first staked by A. Kulan and Associates in 1953. The property was optioned to Prospector Airways, and diamond drilling between 1953 and 1955 proved 7.1 million tons of combined lead-zinc which eventually became known as the Vangorda deposit.

Kerr-Addison Mines Limited (Kerr-Addison) of Toronto eventually acquired Prospector Airways, but interest in the prospect waned because of depressed base metal prices, declining metal markets and the remoteness of the area.

Kerr-Addison resumed exploration of the area in 1962. By 1964, the company had drilled one anomaly which resulted in the discovery of the Swim deposit about 8 km southeast of Vangorda. This deposit contains a resource of 4.3 million tons. Studies have shown that the deposit is uneconomic, and it remains unexploited to the present time.

In 1964, Dynasty Explorations (Dynasty) commenced a detailed exploration program on several claim groups in the Swim-Vangorda-Rose Creek area. Encouraging geochemical results and reported occurrences of mineralized float boulders in the bed of Faro Creek led to the staking of the Faro group of claims.

Dynasty, organized and headed by geological engineer Dr. Aaro E. Aho, discovered the Faro deposit in 1965 following a program of detailed geologic, geochemical, geophysical and prospecting work, extensive airborne geophysical surveys and a major rotary drilling program. Cyprus Mines Corporation (Cyprus Mines) provided joint venture financing in the wildcat drilling stage of exploration.

Cyprus Anvil, a joint venture between Cyprus Mines (60%) and Dynasty (40%), was formed December 1, 1965 to develop the deposit.

By the end of 1967, drilling on the Faro deposit had defined about 63 million tons averaging 9.13% combined lead and zinc and 1.19 oz Ag/ton in two main sulphide bodies. The project was brought into production by Cyprus Anvil in late 1969 and the official opening took place on January 28, 1970.

Direct project expenditures were about \$65 million. In total, over \$100 million was spent by Cyprus Anvil, the Canadian government, White Pass and Yukon Corporation and others. The Government of Canada and the Yukon Territory agreed to provide power facilities, to assist in access roads and a bridge across the Yukon River, and to provide services and mortgages for a townsite.

Sales contracts were signed with Mitsui Mining and Smelting Company Ltd. and Toho Zinc Company Ltd. of Japan for the total mine output over an eight-year period. At the time, it was the largest contract ever signed by Japanese companies for the importation of lead and zinc concentrates. An agreement was signed for transportation of the concentrates with the White Pass and Yukon Corporation who then proceeded to finance an expansion program to build a bulk loading terminal, provide trucking, and improve the railway for Cyprus Anvil and others.

In 1969, Metalgesellschaft AG of West Germany made a loan to Cyprus Anvil which enabled it to increase production by 20%. As a result, Anvil was able to produce an additional 90,000 tons per year of bulk lead-zinc concentrate by raising concentrator capacity from 5,500 tons per day to 7,000 tons per day.

In 1982, concentrate production was halted because of deteriorating metal prices, at which time 40% of the Faro orebody had been mined. Cyprus Anvil proceeded with a \$45 million waste stripping program. In addition, there was extensive redesign and remodelling of the Faro mill, in anticipation of new ore production from the Vangorda plateau. However, by the end of 1982 operations had ceased.

In 1987, **Curragh Inc.** (Curragh) was organized by Clifford H. Frame to acquire the assets of a predecessor partnership which in 1985 had acquired certain of the assets of Cyprus Anvil. These assets consisted primarily of the open pit mine and concentrator at Faro and other orebodies on the Vangorda plateau and mineral properties in British Columbia.

Curragh resumed operations at the Faro Division in the spring of 1986 and made its first shipment of concentrates in June, 1986. Plant capacity was later increased to 14,000 tonnes per day.

In April 1993, Curragh was forced into receivership by its creditors, and in June 1994 the Ontario Court of Justice (General Division) Commercial List approved an Agreement of Purchase and Sale between Peat Marwick Thorne, Inc. (the Receiver) as Interim Receiver of Curragh Inc. and Anvil Range Mining Corporation.

6. GEOLOGY AND MINERALIZATION

6.1 REGIONAL GEOLOGY

The general geology of the Anvil district is shown in Figure 3. The lead-zinc-silver deposits of the Anvil Range are of the sediment-hosted, stratiform, massive pyritic sulphide type. They occur either as: (1) a single, thick, sulphide lens with little or no interbedded sedimentary rocks (e.g. Faro); or (2) multilayered deposits with several, approximately vertically stacked layers with substantial metasedimentary or metavolcanic layers within and between sulphide layers (e.g. Grum and Dy).

The deposits have been subjected to a complex structural and metamorphic history. Present deposit lengths are generally two to three times their widths. Individual sulphide horizons commonly are 10 to 40 m in thickness. The upper and lower contacts of sulphide horizons are sharp, but lateral extensions grade into the enclosing rocks.

The Anvil deposits are examples of synsedimentary, stratiform, massive sulphide deposits and are considered to be originally of submarine exhalative origin.

6.2 GRUM DEPOSIT

The Grum deposit is a stratiform, sediment-hosted sulphide deposit consisting of five or more distinct, contorted horizons of massive and disseminated pyritic sulphides. The sulphide horizons are hosted by phyllites within a 150-m thick stratigraphic interval at the transitional contact of the Vangorda and Mt. Mye formations.

The most important ore horizon occurs immediately beneath the basal carbonaceous member of the Vangorda formation and has been named the "Main Horizon". A second, less important, low grade horizon named the "Champ Zone", consisting of dominantly disseminated sulphide lithofacies, occurs above the Main Horizon. It is generally thin, except

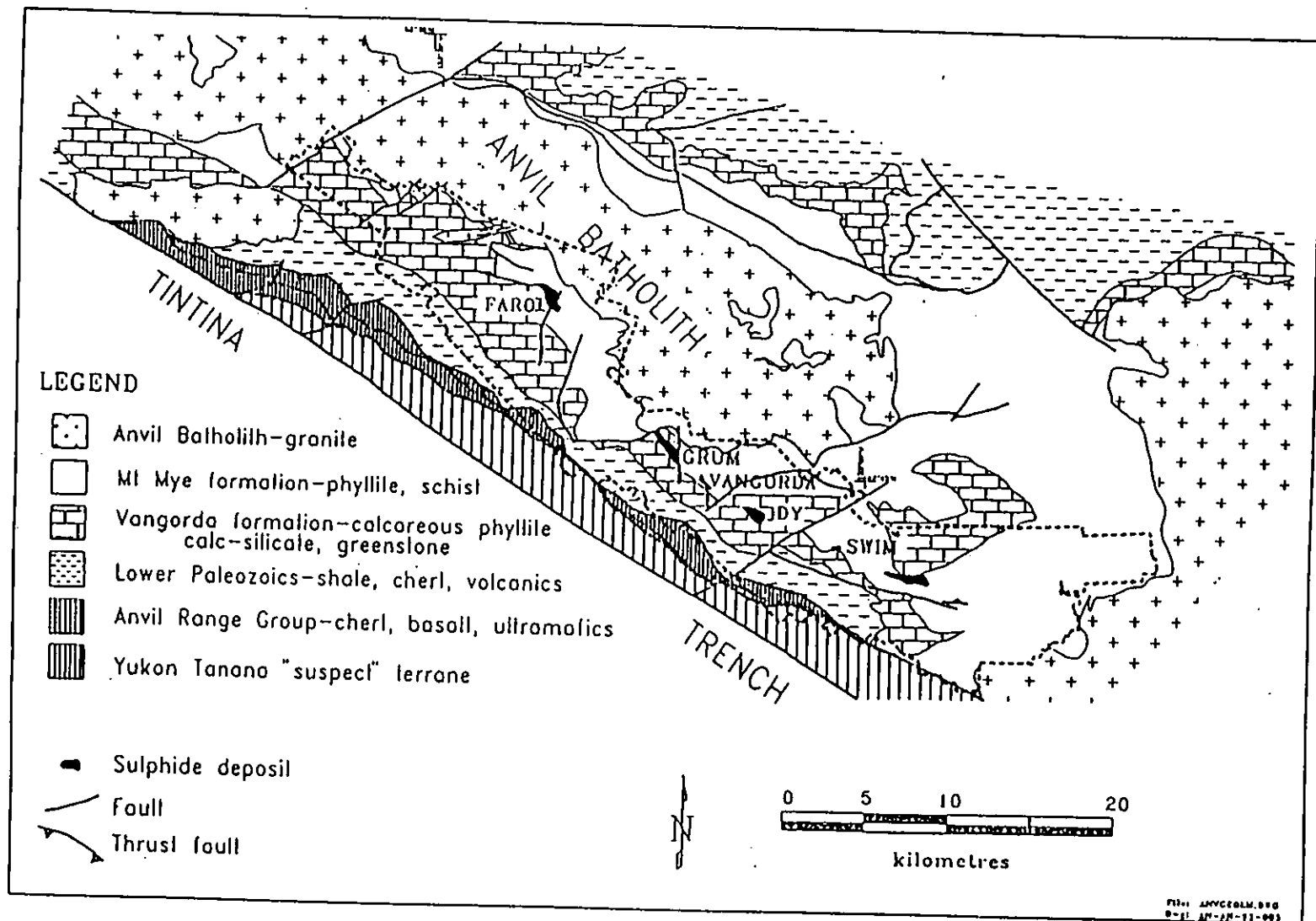


Figure 3. Generalized geological map. Anvil district.

where it thickens in fold hinge zones. A third important horizon, particularly in the lower phases of the Grum pit, is the "Upright Panel Horizon", which derives its name from the fact that it is stratigraphically and structurally upright. The Upright Panel occurs entirely within upper Mount Mye Formation. The ore layers at Grum are contorted into a complex, shallowly northwest-plunging, polyphase fold structure, with prominent "S"-shaped second-phase fold structures being superimposed on a larger "Z"-shaped first-phase anticline-syncline pair (Figure 4).

Several important faults are present, including a series of 60° to 80° trending faults which dip steeply to the northwest and have resulted in apparent dip slip displacements ranging from 5 to 30 m. A steeply southwest dipping fault, which predates the 60° trending faults, cuts the high grade massive sulphide at the top of the Main Horizon and downdrops it to the southwest. A bulk sample collected underground by Kerr-Addison in the 1970s within this fault zone contained unusually abundant middling textures and proved to be metallurgically difficult. Oxidation has penetrated along this fault and affected the adjacent sulphides.

As with other deposits in the Anvil Range, a given ore horizon at Grum tends to have a massive sulphide upper and central portion and a quartzose, disseminated sulphide lower and peripheral portion. The horizons can be up to 30 m thick but are mostly 15 m or less thick. The tops of the horizons tend to be high grade and the bottoms lower grade. The sulphide horizons are separated by significant thicknesses of barren phyllite.

6.3 DY DEPOSIT

The Dy deposit is similar to the other deposits in the Anvil District insofar as it is a multi-layered, polydeformed, sediment hosted sequence of exhalative, massive and disseminated pyritic sulphides. Sulphide layers are variably mineralized and commonly interbanded with metasedimentary and lesser metavolcanic phyllites.

The enclosing rocks are muscovite-chlorite phyllites which are locally altered near the deposit. Metamorphic grade is dominantly greenschist facies. Numerous late hornblende

MEMORANDUM

To J. Keily

FROM: W. Krats

SUBJECT: PROJECT STATUS

DATE: April 23, 1973

Reserve Estimate:

- Zone 1 - Ore tonnage and grade, calculated, accumulated and checked at present.
- Zone 3 - Completion will be realized by early May to the same degree as Zone 1 above.
- Zone 2 - A preliminary run was taken at Zone 2 during the winter. It has been concluded that it is desirable to complete the 1973 diamond drilling and analyze the results before completing a publishable reserve figure in this area.

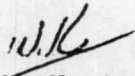
Figures on Zone 1 and 3 will be available internally by mid-year, but the intent is to boil in the 1973 diamond drilling results this fall and publish a formal reserve statement in January of 1974.

Ultimate Pit:

This design is currently in progress and should be complete by early May. This pit will include virtually all 5% or greater lead plus zinc material estimated in the reserve estimate for Zones 1 and 3.

Five Year Plans:

Work is presently underway on plans through to and including 1978. Work at present is progressing along the avenue of supplying all mill feed from Zone I. Stockpiles are not presently being included because no metallurgical data is available regarding the feasibility of processing this material. The end of May should see completion of the first run on a year by year basis through 1978. These will be refined by August 1, 1973 for presentation along with the 1974 mining plan for budget purposes.


W. Krats
Chief Engineer

WK/mm

diorite and quartz feldspar porphyry dikes cut the deposit, with the greatest concentration being at the east end of the deposit.

The Dy deposit is 480 to 690 m below surface and dips 25°-30° southwest. The strike length of the known mineralized zone is approximately 2,200 m. The zone has a width of up to 1,800 m, and the aggregate thickness ranges from 10 to 160 m, with several mineralized horizons being separated by intervals of waste. These mineralized horizons span a poorly defined transition zone from the Mt. Mye Formation to the younger, calcareous Vangorda Formation.

The deposit is amoeboid-shaped in plan view. It is unusual for the Anvil District in that it has two well defined zones in which the lead-zinc ratio varies: in the southwest, the A zone is relatively lead-rich; and in the northeast, the B zone is relatively zinc-rich. The A Zone is comprised of baritic massive sulphides hosted within phyllites, while in the B Zone the sulphides are more disseminated than massive and are hosted by graphitic quartzites.

The internal structure of the Dy deposit is poorly understood because of the lack of data. However, it is reasonable to suspect that the structural complexity of the other more densely drilled deposits on the Vangorda Plateau (Vangorda, Grum), which show several phases of folding, also exists at Dy (Figure 5). The deposit is cut by numerous steep faults and, in addition, there are important shallow-dipping faults immediately beneath the deposit. Many of the faults, especially the steeply dipping ones, contain significant clay/mud gouge and are water-bearing. Two important faults were detected in the shaft pilot hole. The lower fault is perhaps the more significant of the two in that it may truncate the ore zone along its northeast boundary.

There are several sulphide lithofacies which comprise all of the Anvil District deposits. Drilling to date at Dy indicates that the bulk of the higher grade material is massive sulphides.

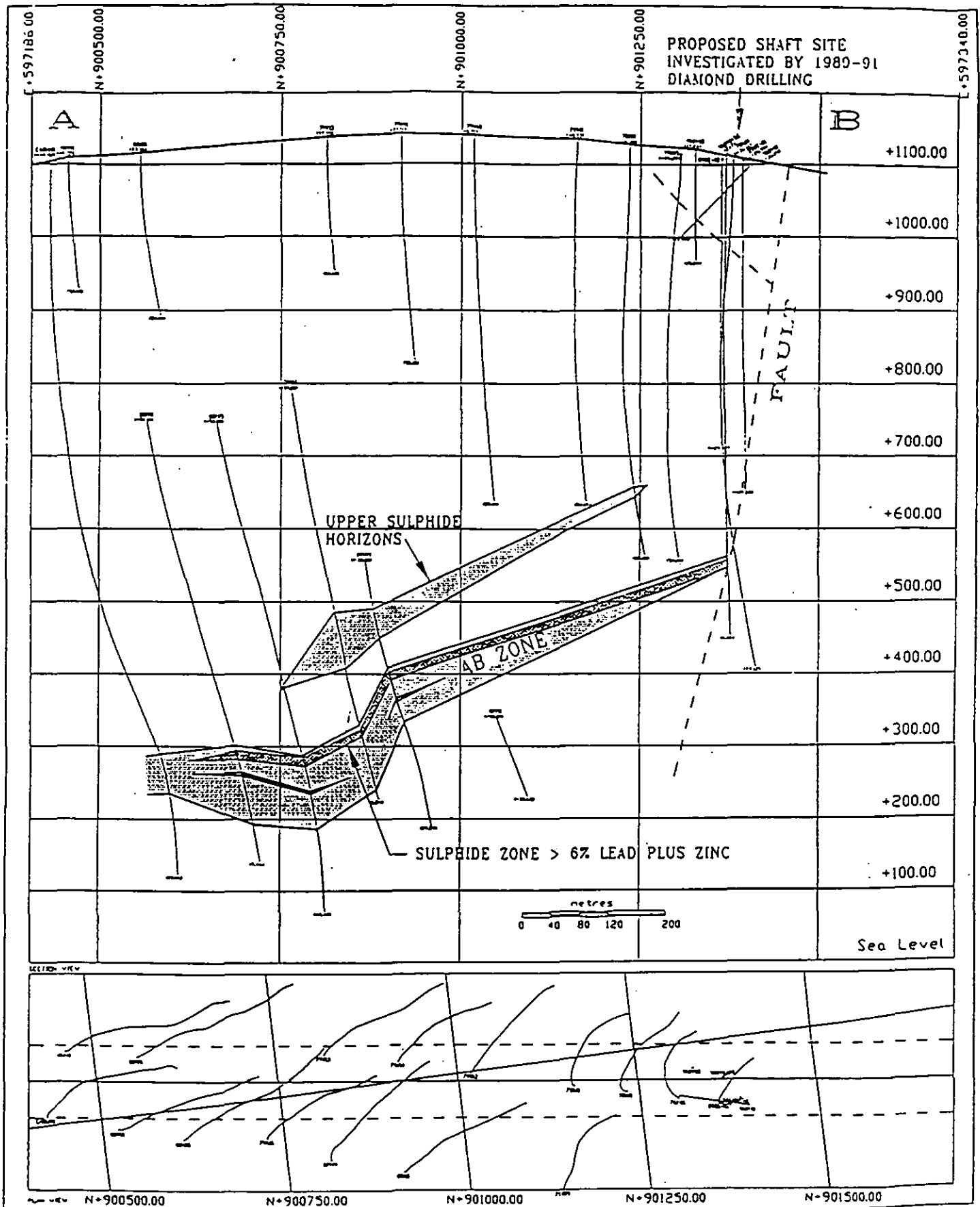


Figure 5. Dy deposit. Vertical section.

7. MINERAL RESOURCES AND ORE RESERVES

7.1 GENERAL

The most recent estimate of reserves in the Faro deposits by Curragh was dated January 1, 1993. WGM completed a review and audit of these reserves and resources as at January 22, 1993, adjusted for the tonnages mined in the previous three weeks.

Following the closure of the Faro operations in April, 1993, Curragh issued a revised statement of resources and reserves. It adjusted the January 1 estimate for the tonnages mined from January 1 to the date of the shutdown. These adjusted tonnages and grades were reviewed by WGM and are summarized in Table 1.

TABLE 1
FARO PROPERTY
SUMMARY OF RESERVES
(Audited by WGM in January 1993; adjusted in April 1993)

	Tonnes	Zinc (%)	Lead (%)	Zinc + Lead	Silver (g/t)	Gold (g/t)
Proven						
Vangorda Open Pit	1,005,000	4.40	3.60	8.00	46.9	0.92
Stockpiles	<u>2,598,000</u>	<u>2.89</u>	<u>1.96</u>	<u>4.85</u>	<u>17.9</u>	<u>0.19</u>
Subtotal Proven	3,603,000	3.31	2.42	5.73	26.0	0.82
Probable						
Grum [IV Pit (exc. Champ)]	24,760,000	4.54	2.74	7.28	46	0.70
Probable						
Dy Underground	<u>9,390,000</u>	<u>6.62</u>	<u>5.50</u>	<u>12.12</u>	<u>80.3</u>	<u>0.82</u>
TOTAL	37,753,000	4.94	3.40	8.34	52.6	0.70

7.2 DEFINITIONS

7.2.1 DEFINITIONS USED BY CURRAGH

In classifying reserves in the Vangorda and Grum deposits, Curragh geologists essentially used the definitions of proven, probable and possible ore contained in the Ontario regulations and presented in National Policy 2-A "Guide for Engineers, Geologists and Prospectors Submitting Reports on Mining Properties to Canadian Provincial Securities Administrators", as follows:

Ore means a natural aggregate of one or more minerals which, at a specified time and place, may be mined and sold at a profit, or from which some part may be profitably separated.

Probable or indicated ore means that material for which tonnage and grade are computed partly from specific measurements, samples or production data, and partly from projection for a reasonable distance on geological evidence, and for which the sites available for inspection, measurement and sampling are too widely or otherwise inappropriately spaced to outline the material completely or to establish its grade throughout.

Possible ore or inferred ore means that material for which quantitative estimates are based largely on broad knowledge of the geological character of the deposit and for which there are few, if any, samples or measurements, and for which the estimates are based on assumed continuity or repetition for which there are reasonable indications, which indications may include comparison with deposits of similar type, and bodies that are completely concealed may be included if there is specific evidence of their presence, and

- (i) estimates of possible ore or inferred ore shall include a statement of conditions within which the inferred material occurs, and
- (ii) since the arithmetic average of any amount of sampling is not necessarily representative unless the distribution of values and number of samples are properly taken into account, a statement of how samples were taken shall be given, and where mineralization is erratic, the method of treating the erratic values shall be given in the narrative of the report.

However, in classifying the mineralization from which the reserves were derived in the Dy deposit, the definitions **probable mineralization** and **possible mineralization** were used, and

the total of the probable and possible in situ mineralization was referred to as **Mineral Inventory**. These definitions are as follows:

Probable mineralization is that in a sulphide horizon which can be correlated with reasonable confidence and is delineated both up and down dip and along strike by diamond drilling or limited by well known structural or topographic discontinuity. The range of extrapolation within the zone can be justified by comparison to other deposits of similar nature in the same region.

In plan view, this criterion results in restricting the probable material to that within a limit inside of the last peripheral hole in the drill array.

Possible mineralization is the result of a quantitative estimate based on widely spaced drillholes and largely on broad knowledge of the geological character of the deposit and similar nearby deposits. The continuity of the mineralization is not necessarily confirmed up or down dip or along strike by drillholes or other sample points.

7.2.2 DEFINITIONS USED BY WGM

In classifying the resources and reserves on the Faro property, WGM used the definitions outlined in the Australasian Code for Reporting Mineral Resources and Reserves, which is becoming an internationally accepted standard. The Australian definitions are very similar to the new draft definitions of the **Canadian Institute of Mining, Metallurgy and Petroleum (CIM)** which are currently under review by the CIM membership and others with an interest in the mining industry. The Australasian definitions are as follows:

A **Mineral Resource** is defined as an identified in-situ mineral occurrence from which valuable or useful minerals may be recovered. Mineral Resources are subdivided into:

- Inferred Mineral Resources,
- Indicated Mineral Resources, and
- Measured Mineral Resources.

In defining a Mineral Resource, the ..[Geologist].. will only take into consideration geoscientific data. In reporting a Mineral Resource, there is a clear implication that there are reasonable prospects for eventual economic exploitation.

Mineral Resource estimates are not precise calculations, being dependent on the interpretation of limited information on the location, shape and continuity of the occurrence and on the available sampling results. Reporting of tonnage/volume and grade figures should reflect the order of accuracy of the estimate by rounding off to appropriately significant figures and, in the case of inferred Mineral Resources, by qualification with terms such as 'approximately'.

The term **Inferred Mineral Resource** means a Mineral Resource inferred from geoscientific evidence, drillholes, underground openings or other sampling procedures where the lack of data is such that continuity cannot be predicted with confidence and where geoscientific data may not be known with a reasonable level of confidence.

An **Ore Reserve** is defined as that part of a Measured or Indicated Mineral Resource which could be mined, inclusive of dilution, and from which valuable or useful minerals could be recovered economically under conditions realistically assumed at the time of reporting. Ore reserves are subdivided into:

- Probable Ore Reserves; and
- Proved Ore Reserves

The term **Probable Ore Reserves** means Ore Reserves stated in terms of mineable tonnes or volumes and grades where the conditions are such that ore will probably be confirmed but where the in situ identified Resource has been categorized as 'Indicated' and has not been defined with the precision necessary for the 'Measured' category. Probable Ore Reserves includes ore that has been sampled on a pattern too widely spaced to ensure continuity.

The term **Proved Ore Reserves** means Ore Reserves stated in terms of mineable tonnes or volumes and grades in which the identified in situ resource has been defined in three dimensions by excavation or drilling, and may include additional minor extensions beyond actual openings and drillholes, where the geological factors that limit the ore body are known with sufficient confidence that it is categorized as a 'Measured Resource'.

7.3 GRUM

7.3.1 PREVIOUS ESTIMATE

Curragh geologists used a computer block model (referred to as model G9110) to estimate reserves in the Grum deposit. All of the surface grids in this model were created in

GEOMODEL from digitized surface elevation contours, and the surfaces were calculated using the average of row and column elevation calculations. Geology for the block model involved a new interpretation of cross sections, longitudinal sections and level plans using all information through the 1991 drilling program.

Rock type polygons were transferred to PC-MINE from the GEOMODEL level plan geological interpretations. Overburden was entered into the model by hand contouring the elevations from tricone drillhole data in plan at 5 m intervals. This surface was digitized into GEOMODEL, and mid-bench elevation contour lines of this surface grid were then incorporated into the plan geological interpretation.

Drillholes were entered into PC-EXPLOR database B. Assays for the quartzose ores and massive sulphide ores were grouped and analyzed using histograms. Lead, zinc, silver and gold assays as well as pulp specific gravities (Sgs) were then cut to the 95th percentile. Drillhole assays were composited in 6-m bench intervals, the composite location being given by the mid-bench elevation. PC-EXPLOR was used to calculate equal length composites for geologic intervals based on the geological interpretation on cross sections, longitudinal sections and level plans. Internal waste intervals were included as "zero grade" assays for all elements.

Models for SG, lead, zinc, silver and gold were interpolated in four passes using combinations of search parameters varying as follows:

North search	50 to 75 m
East search	50 m
Elevation search	11 m
Tilt	-11°

Grades and Sgs were calculated using inverse distance weighting, and geological in-situ reserves (in-situ/no dilution/no mining loss) were calculated at cutoff grades for combined Pb+Zn of 3%, 4%, 5%, 6% and 8%. The cutoff grade applicable to the estimates in this

report is 3% combined Pb+Zn. After the interpolation was completed, the specific gravity model was edited using program RKDENS to put in the missing SG values.

At a cutoff grade of 3% Pb+Zn (which is roughly the break-even grade for open pit ore in the Faro district), Curragh estimated that the Grum deposit (excluding Champ) contains a mineral resource of 24.76 million tonnes with an average grade of 2.74% Pb, 4.54% Zn, 46 g Ag/t and 0.87 g Au/t.

7.3.2 WGM AUDIT

In order to confirm the Grum geological in-situ undiluted reserves, WGM estimated the reserves for Vertical Cross Section 70W, row 107, using the polygon method and compared the result with tonnage and grade summaries provided to us by Curragh. The row strike length was 7.6 m centred on the section line.

WGM was provided with the section showing geology and composited assays over 2-m intervals. We interpreted the geology, defined our own ore blocks (32 in total) and averaged the composited assays and rock specific gravities into block composites. Assay composites and Sgs were weighted by sample length. We planimetered each block to obtain areas, multiplied areas by the row interval to obtain volumes and multiplied volumes by average block Sgs to obtain tonnage.

As a result of these checks we are satisfied that the Curragh reserves were calculated properly and the figures so obtained are reasonable.

In addition, mining experience at Faro and Vangorda supported Curragh's estimates.

7.4 DY

7.4.1 GENERAL

The bulk of the high grade mineralization occurs in one thick layer referred to as the AB Zone, which includes the A and B horizons. The AB Zone has not been fully delineated by diamond drilling, but Curragh geologists made an attempt to quantify possible lateral extensions. It is likely that mineralization intersected above and below the AB Zone represents fold repeats, fault dislocations or lateral extensions of the layer, or additional separate layers. Curragh considers this material to represent additional potential, and calculated a tonnage and grade distinct from the AB Zone.

7.4.2 PREVIOUS ESTIMATE OF RESOURCES AND RESERVES

Curragh geologists completed an estimate of resources in the Dy deposit in 1991. Their estimate is summarized in Table 2.

Curragh's probable resource category is equivalent to WGM's indicated resources.

Indicated and Inferred Resources

The methods used by Curragh in calculation of the tonnage and grade of mineralization in the deposit were as follows:

All drillhole data in the vicinity of the Dy deposit was entered into a computer database using Gemcom PC-EXPLOR database software. Using this database, vertical cross sections and longitudinal sections were plotted at 50-m intervals at 1:1,250 scale.

The inventory for the AB Zone was calculated at Pb + Zn cutoffs of 6%, 8% and 9% over a minimum core length of 3.5 m. A number of drillholes had more than one qualifying intersection; these were summed for the drillhole to make up one composite.

TABLE 2

AB ZONE, DY DEPOSIT
SUMMARY OF MINERAL RESOURCES
 (Original estimate by Curragh in 1991; audited by WGM in 1993)

	Tonnes	Pb+Zn (%)	Pb (%)	Zn (%)	Ag (g/t)	Au (g/t)
6% Pb+Zn Cutoff						
Probable	24,949,000	9.70	4.21	5.49	63.0	0.67
Possible	<u>10,348,000</u>	<u>10.43</u>	<u>4.01</u>	<u>6.42</u>	<u>61.3</u>	<u>0.62</u>
Total	35,297,000	9.91	4.15	5.76	62.5	0.60
8% Pb+Zn Cutoff						
Probable	14,895,000	12.06	5.43	6.63	80.0	0.87
Possible	<u>6,720,000</u>	<u>12.59</u>	<u>4.84</u>	<u>7.75</u>	<u>63.4</u>	<u>0.80</u>
Total	21,605,000	12.23	5.25	6.98	78.0	0.84
9% Pb+Zn Cutoff						
Probable	13,133,000	12.58	5.71	6.87	83.1	0.86
Possible	<u>5,389,000</u>	<u>13.62</u>	<u>5.26</u>	<u>8.36</u>	<u>78.2</u>	0.85
Total	18,522,000	12.88	5.58	7.30	81.7	0.85

Curragh was of the opinion that drillhole spacing at Dy is not adequate to allow a substantial portion of the deposit to be classified as proven. The estimated tonnage of mineralized material was classified as probable or possible based on a number of criteria, including to a large degree the experience of the geologists with other deposits in the Anvil District. The mineralization in the interior of these deposits is reasonably continuous on a broad scale, but highly unpredictable in detail.

In plan, the area of influence of a drillhole is considered to be halfway (maximum of 150 m) to the adjacent drillhole where the deposit is reasonably defined by drilling. In drillholes at the edges of the ore zone, the area of influence is arbitrarily defined as 60 m beyond the drillhole.

Polygon volumes were calculated by multiplying the vertical thickness of the composites by the polygon area, and the volumes converted to tonnage using a density of 3.92 tons/cu m. An extension was added to the AB Zone which extended projection of peripheral holes by about 30% and smoothed out irregularities in the Zone (Figure 6). Since the zone is expected to thin gradually in this area, the tonnage was reduced by half.

Some of the additional mineralization above and below the AB Zone exceeds the grade/cutoff criteria. However, continuity of horizons could not be established as they comprise isolated intersections or they are too widely spaced to join with other intersections. To reflect the potential that these intersections represent, a calculation was made based on a radius of influence of 50 m and a vertical thickness equal to the composite length.

Probable Reserves

Using the available information on the estimated in-situ reserves, Curragh estimated a total mineable reserve of 9,400,000 tonnes at a grade of 6.64% Zn, 5.52% Pb, 80 g Ag/t and 0.83 g Au/t using a cutoff of 9% Pb+Zn. This estimate was completed in 1993.

In 1992, Canadian Mine Development (CMD) developed a proposal for a shaft sinking, development and underground exploration program to access a portion of the deposit. The available geological in-situ reserve in this initial phase of the program was estimated at 7.2 Mt. No grade estimate was provided. We have reviewed CMD's calculations and concur with the results.

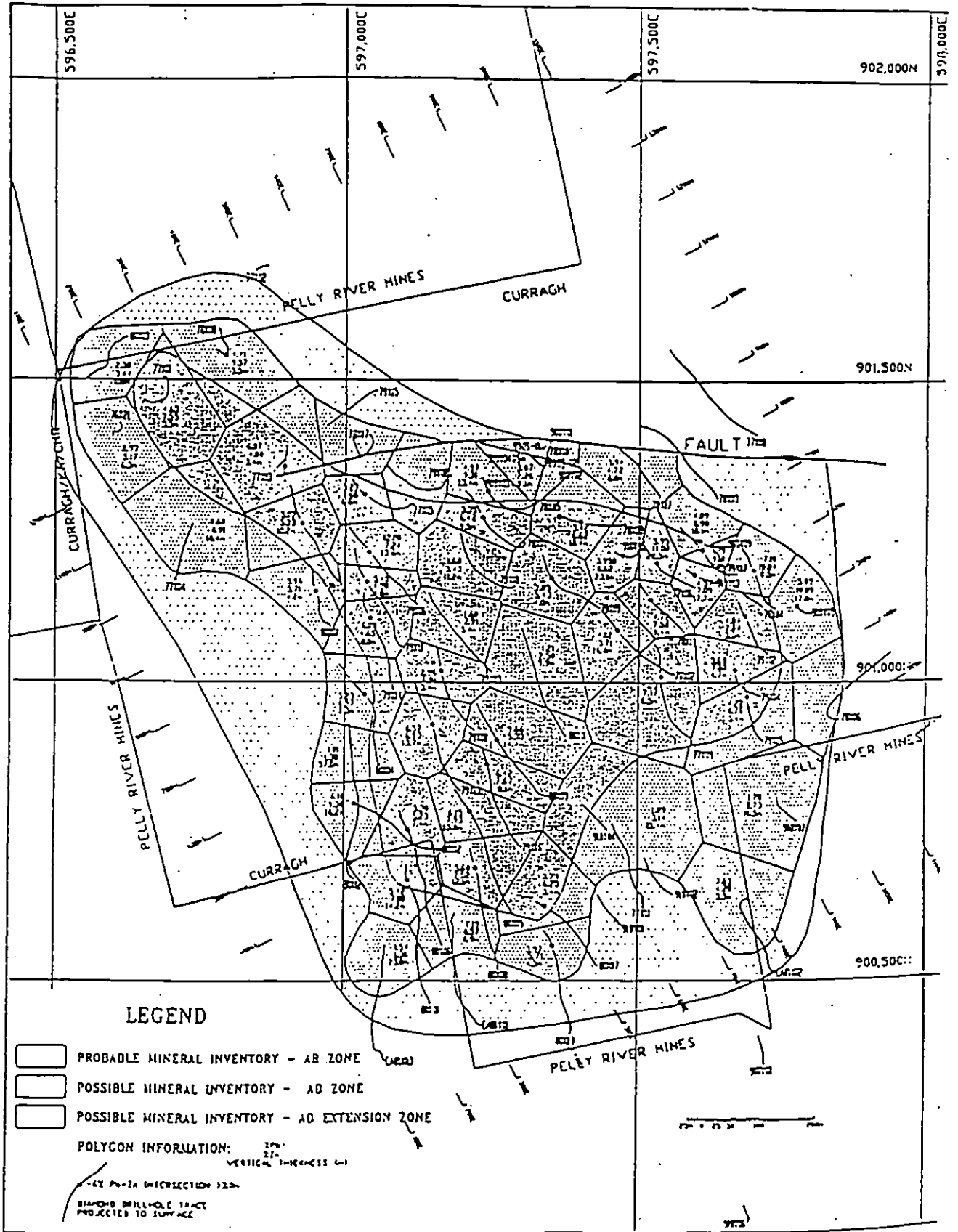


Figure 6. Dy deposit. Mineral inventory polygonal at estimate, 9% lead and zinc cutoff.

V LARGE FARO DEPOSIT

a) 3910 to 3590 benches inclusive from 8,500 N to 11,400 N and 12,000 E to 16,100 E.

A new tonnage and grade estimate was prepared for this portion of the Large Faro Deposit to allow comparison of the new complete estimate with the blasthole data on some of the benches and to have adequate estimates for five year mining plan.

Estimated Tonnage and Grade Tables, January 1973 (see Appendix I) and Estimated Tonnage and Grade Bench Plans (see Appendix II) show the distribution and the totals completed and checked to date. Final copies of the ink drafted bench plans will be available on request when they have been completed.

b) 3550 bench and below from 8,500 N to 11,400 N and 12,000 E to 16,000 E also all benches from 6,600 N to 8,500 and 12,900 E to 17,000 E.

The sections have been completed and the bench plans have been started. Work on this portion of the deposit is progressing as man power becomes available.

VI SMALL FARO DEPOSIT

A total tonnage and grade estimate has shown that the major trend direction is not similar to the Large Faro Deposit. This trial estimate has outlined approximately 2.9 million tons of 2.78% Pb and 4.76% Zn.

8. EXPLORATION POTENTIAL

WGM relied primarily on information provided in technical presentations by and discussions with the Curragh exploration staff in order to arrive at an understanding of the exploration model for the district and an appreciation of the areas that are likely to produce positive exploration results in the future. The following discussion is based on notes made during the presentations and on technical reports that were provided by Curragh.

The ore deposits of the Anvil District are stratiform and confined to an approximately 150 m to 200 m thick stratigraphic interval which includes the contact of the Mt. Mye and Vangorda Formations. This stratigraphic position suggests that the mineralization is Cambrian in age.

The known deposits occur along a 25-km long curving trend which follows the prominent fold axial trends of the district. Southwest of the trend there is a tendency for the basal carbonaceous member of the Vangorda formation to thicken. The ore horizons tend to occur at the base of thick carbonaceous units, suggesting that the exhalative ore-forming event was the initial stage in the formation of an anoxic sub-basin.

Detailed mapping and drilling suggest that the linearly distributed deposits lie close to a northeasterly "pinch out" or "zero edge" of the basal carbonaceous member of the Vangorda Formation. To date, no sulphide deposit lithofacies have been encountered in a small number of holes drilled through the ore-bearing horizon southwest or northeast of the deposit line. The linear trend suggests that hinge lines of sub-basins are fault controlled. These faults may have provided channels to the sea floor for ore fluids, leading to sea floor exhalation and consequent sulphide deposition in the sub-basins where reduced sulphur was available.

The sulphides have a number of physical characteristics which lend themselves to detection by geophysical exploration. Because of the high density of the massive sulphides (4.0 to 4.5), they present excellent density contrasts against all of the rock units and strong positive gravity anomalies. Because of this density contrast, gravity surveys have been an important

and definitive exploration tool in the district. As the search depth increases, however, gravity surveys rapidly become ineffective.

While the massive sulphides are conductive, they are actually less conductive than associated carbonaceous phyllites or graphitic quartzites. Several sulphide lithologies are pyrrhotitic and/or magnetite-bearing and are strongly to weakly magnetic. Magnetic methods may therefore be used as an exploration tool.

Exploration in the Anvil District has passed through several phases since the early 1950s when the first discovery was made at Vangorda Creek. Each phase of exploration has resulted in deposits being detected at greater depths of burial. As target depths increased, gravity became an ineffective screen, and attention turned toward subtle anomalies supported by geology and to blind drilling of possible targets indicated by geology. The Dy discovery was the result of testing the structural and stratigraphic model discussed above.

The program of deep drilling which led to the Dy discovery was so designed that the spacing of the holes was sufficient to detect targets of various sizes at various depths, i.e., a Swim-sized (4.3 Mt) target to 330 m and a Faro-sized (50 Mt) target at greater depths. The discovery hole at Dy was specifically designed to test the favourable trend where the geologic model predicted favourable stratigraphy at a depth of 600 m.

Following the Dy discovery, emphasis was placed on delineating the deposit; as a result, the regional deep drilling program was essentially curtailed. It was resumed in the period 1979-1981, when several deep holes were drilled to test the down-dip extensions of the Faro, Vangorda and Swim deposits and several others were drilled elsewhere on the property. Unfortunately, at that time the stratigraphic model was incompletely developed and some of the holes were stopped above the favourable interval.

The stratigraphic sequence as presently understood provides a good "shutdown unit", i.e., the marble and mixed schist - calc-silicate sequence about 500 m to 700 m below the top of the Mt. Mye Formation. This unit should be targeted in future drilling programs, with the

potential for locating another Grum- or Faro-sized deposit considered to be very good.

For the Dy deposit, specifically, considerable potential exists for extending the deposit by additional step-out drilling, as the deposit is closed off by drilling only locally.

Curragh geologists were of the opinion, and WGM concurs, that the area to the east of the deposit should be explored at least up to the fault which parallels Blind Creek (not shown on maps). Some of the peripheral intersections in that area are quite good, and Cyprus Anvil only terminated drilling towards the east because they were concerned that shallow dipping dykes or sills may have interfered with the ore horizons. Additional step-out drilling will also be required to the west and south of the deposit.

According to Curragh geologists, there also has been considerable speculation to the effect that another deposit may be present about 1 or 2 km to the north of the Dy beneath the thick sequence of mafic igneous rich Vangorda formation which has been preserved there. These concepts should be evaluated by deep drilling in that area.

9. MINING

9.1 INTRODUCTION

Anvil Range's mine plan for the Faro property assumes that dewatering of the Vangorda open pit will be completed in the spring of 1995 following which processing of the remaining reserves from the Vangorda open pit will commence. Stockpile ore will also be processed for approximately three or four months.

Anvil Range plans to begin mobilization for stripping operations within 30 days of the necessary financing being completed. Processing of ore from the Grum orebody is expected to commence approximately one year thereafter, and this deposit will provide the majority of the mill feed to the Faro concentrator through 2002. In order to maintain production at the concentrator, the Dy deposit is expected to commence production on a limited basis in the year 2001. In the final years of production, all of the ore production will come from the Dy deposit.

9.2 DEVELOPMENT PLAN FOR GRUM

The lead-zinc ore zones which comprise the Grum deposit will be mined by conventional open pit techniques, employing drilling and blasting, loading with rope shovels, and transport to the concentrator by truck or by way of intermediate stockpiles for some of the material. Towards the end of the mine life, some ore may be mined by underground methods, with it being accessed from the bottom and side walls of the open pit. The methods are essentially identical to those that have been used in the past to mine the Faro and Vangorda deposits and the required technology is well developed.

Mine planning for the Grum orebodies is based on the representation of the orebody as a series of blocks, each of which represents a finite volume of material to be removed from the mine. Each block is assigned the attributes of rock type, ore tonnage and grade of each metal

of interest, and the assemblage of blocks represents the mine in three dimensional space.

Rock type (lithology) is assigned to each block by a manual interpretation technique, in which a considered interpretation of the geology of the deposit is transposed onto level plans. One level plan is constructed for each bench in the mine, coinciding with the bench mid-height elevation.

When production ceased in April 1993, plans for the Grum deposit were in the optimization stage. Several options had been tested, and had been demonstrated as feasible mine plans by keeping track of the ore and waste to be mined in each year of operation, along with the equipment required to do so.

WGM examined three of the options that had been studied by Curragh, namely the Grum pit, the Grum pit including the Champ area, and the so called AB pit, which also includes the Champ area. Of the three options, the Grum pit without the Champ area (Grum IV pit), was considered by the operator to be the option of choice. This plan was examined by WGM and is considered feasible, although it has been noted that during some periods the operation will be relatively "tight" for ore. The tight periods will likely be removed during the next iteration of the planning cycle, and we foresee no difficulties in doing this. It is also noted that the Grum pit plan which includes the Champ area may be developed later.

On an operational level, mine planning and budgeting should follow the systematic Mine Capacity Plan procedure developed by Curragh during the Faro and Vangorda operations. This form of operational planning identifies all of the tasks and activities required to operate the mine and maintain the mine equipment. The necessary resources are then assigned to the activity plan, and the totals compared with the resources available. Any disparity between the resources required and those available is then rationalised in terms of a revised plan or the supply of additional resources.

WGM found this short term operational planning cycle, and its commitment to systems, to be "state-of-the-art" in terms of operational planning and budgeting.

Dilution, the contamination of ore grade material by surrounding waste, and losses, the misplacement of ore grade material to waste, both happen as a consequence of the mining operation. It is important to the economics of any mining operation that these two factors are correctly estimated, and that methods are implemented during the mining operation to limit their effects.

WGM was able to review the estimation procedures for both dilution and mining losses in use in 1993 by the operations personnel, and to observe their impact on the Grum ore reserve. Generally, and for the purposes of long term planning, all ore blocks which have one or more faces adjacent to waste are assumed to be diluted with 25% waste material at zero grade. All diluted blocks which fall below cutoff grade when so diluted, are removed from the mineable reserve. This means that some small thin ore zones of low grade are completely eliminated from the mineable ore. The short term planning cycle completely re-examined the ore/waste interface and specific plans were made to deal with grade control and dilution on a case by case basis.

WGM agreed with this approach of the Curragh operations staff to grade control, and noted that the techniques which had been developed in the Faro and Vangorda operations would be implemented at Grum. We believe that Anvil Range should follow similar procedures.

9.3 MINING OF THE DY DEPOSIT

The ore mineralization at Dy lies at considerable depth and must be mined exclusively by underground methods. Several alternative methods of access to the ore have been examined, but the method of choice is development by means of a vertical shaft, chosen largely because of its reduced environmental impact compared with other methods.

The ore zone is a sub-horizontal sheet of sulphide mineralization interbanded with phyllite. Dips average 25° to 30° but are locally much steeper. The proposed mining method envisages room and pillar methods using trackless technology where the dips are less than about 25% (14°), and slusher methods where the orebody dips more steeply. A few areas

may be either thick enough or steep enough to permit open stoping.

Lateral development will be by means of haulage drifts driven in the footwall in the approximate direction of the strike of the orebody. These laterals will be connected to each other and the shaft by means of a 20% ramp, driven where possible in the footwall of the orebody, and connected to the footwall laterals by means of a short crosscut.

The production shaft is planned to be developed from surface at 1140 elevation in two phases, the first of which places the shaft bottom at 350 m elevation with a later deepening to 190 m elevation. This produces shaft depths of 790 m and 950 m respectively. The southern extremity of the orebody is lower than the bottom of the shaft, and access must be either by ramp or a further deepening of the shaft. It is expected that development work will commence in the year 2000 and that production will commence in 2001-2002.

The ore transportation system will be by scooptram and truck in the orebody and in the lateral development horizons to a series of ore passes driven in the footwall and protected by a rockbreaker/grizzly combination. Current planning is to transport the ore from the bottom of the ore passes by feeders onto a conveyor discharging into an underground coarse ore bin. The bin in turn will be arranged to feed each of two skip pockets for hoisting.

In general, we agree with the planning as presented but note that it is incomplete as far as mining the entire orebody is concerned. We are also of the opinion that, in this case, conveyor haulage might be replaced with advantage by an electric truck system, particularly if future down dip ore must be hauled up a ramp to the shaft bottom. Such considerations do not however affect the general viability of the proposals.

The production of ore from the Dy orebody is to be preceded by an underground exploration program. During this phase the proposal is to use the shaft as both an intake and return airway. WGM is concerned that this approach might not be looked upon with favour by the regulatory authorities. If the approach is not permitted then it will be necessary to install the ventilation raise immediately after the shaft is finished, as it will be required during

production in any event.

In addition, in spite of the environmental constraints, WGM would recommend a re-examination of an exploration ramp from the best surface location. It is likely that such a ramp could be completed for less cost than the concrete lined shaft, and could act as a ventilation and escape system after a production decision is reached.

The draw-back with this scheme is that a shaft is needed for production and must be installed later, which would delay production of Dy ore.

WGM reviewed the operating cost scenarios developed for the Dy operations by Canadian Mine Development and considers these costs to be reasonable and attainable.

10. METALLURGY AND PROCESSING

10.1 GRUM

10.1.1 METALLURGICAL TESTING

The original testing of samples from the Grum property was carried out by Noranda/Kerr Addison (Noranda), from 1974 to 1976 at Lakefield Research (Lakefield) and in the Noranda laboratories. These first tests consisted of flotation testing of samples of diamond drill core from the deposit. Some of these tests gave acceptable results. However later testing on a bulk sample from underground showed poor results.

An investigation into the poor metallurgy identified the problem: the bulk sample was strongly oxidized and had fine intergrowths of galena in sphalerite, neither of which was representative of the Grum deposit. Testing of samples that were more representative of the deposit yielded acceptable lead and zinc concentrate grades. In-house testing by Cyprus Anvil confirmed that the Grum samples were amenable to the flowsheet used in the Cyprus Anvil (Faro) mill although the lead concentrate grade was low. An extensive test program including pilot plant work was performed at Lakefield Research in 1978 and demonstrated that satisfactory lead and zinc concentrates could be produced.

A sample sent to Dowa Mining in 1976 also produced satisfactory grades of lead and zinc at recoveries in the order of 70 to 75%.

In 1990, Curragh undertook an extensive program of testing at Lakefield. Three composites representing the three ore types recognized in the deposit were tested, as follows:

- disseminated sulphides, carbonaceous quartzite and minor graphite;
- disseminated sulphide with non-carbonaceous quartzite; and
- massive sulphide ore (which resembles the sample tested previously at Lakefield).

The Lakefield tests showed that respectable metallurgical results could be obtained on all three composites using a modified reagent scheme and with additional regrinding capacity in the lead circuit. Reagent changes included the use of SD200 to partially replace cyanide as a zinc depressant. The three composites were combined into a master composite representative of the Grum deposit, and flotation testing showed this composite to be amenable to the flowsheet developed for the individual composites.

Grinding tests showed that the Grum ore is similar to the Faro ore but harder than the Vangorda ores. The testwork also showed that finer grinding of the lead concentrate is required to produce concentrate grades in excess of 60% Pb. A grind of 80% passing 12 microns liberates the lead and zinc minerals, and the zinc minerals pass to the zinc circuit for subsequent recovery.

In 1992, a further test program was designed to develop the best flowsheet for the lead regrind circuit. The development of a high intensity conditioning stage to improve zinc flotation response was developed during this testwork. This testwork confirmed that regrinding is required, and that the lead rougher concentrate should be ground in three stages to achieve a lead concentrate grade of 60% Pb.

The 1992 test program included testing of the lower grade quartzite cap rock that will be initially processed from the Grum deposit. Lower concentrate grades and recoveries were obtained compared to the master composite but were expected because of the lower grade. However, no problems in the pre-activation of the lead minerals as were experienced with the Vangorda deposit were apparent.

A summary of the results from the testing of Grum ore is shown in Table 3.

Table 3

SUMMARY OF GRUM METALLURGICAL TESTWORK

	HEADS				LEAD CIRCUIT								ZINC CIRCUIT				REMARKS		
	%Pb	%Zn	Ag g/t	Au g/t	CONCENTRATE GRADE				%RECOVERY				GRADE		%RECOVERY				
					%Pb	%Zn	Ag g/t	Au g/t	Pb	Zn	Ag	Au	%Zn	Ag g/t	Zn	Ag			
1976 TESTWORK	8.36	15.80			56.7	12.7								56.1				Noranda/Kerr Addison/Lakefield	
1976 TESTWORK	3.33	5.22			64.3				71.5					49.7	78.0			Dowa Mining results	
1977 TESTWORK	4.70	0.30			45.0	9.0			75.0					52.0	80.0			Noranda	
1978 TESTWORK	5.80	10.00	94.6	0.7	65.4	9.5	857	3.4	78.1	6.6	72.5	48.8	54.5	73.0	79.8	12.4		Lakefield Pilot Plant-single shift	
	5.80	10.00	94.6	0.7	60.9	10.8	926	3.8	75.6	7.7	74.8	50.0	52.1	68.9	75.5	9.8		Lakefield Pilot Plant-continuous run	
1990 TESTWORK	2.68	4.08	39.5	0.6	67.6	5.2	852	6.0	66.8	3.6	74.2	34.3	56.4	45.8	84.4	6.6		Lakefield Testing	
	3.65	6.30	62.8	0.7	65.4	7.5	977	6.7	60.8	6.1	70.1	48.2	56.6	44.6	83.2	6.6		G1-Disc. sulphides/carbonaceous quartzite/ minor carbon	
	4.97	9.40	78.8	1.6	68.6	6.1	900	16.6	63.2	3.9	68.7	63.0	53.3	66.2	84.5	12.9		G2-Disc. sulphides/ non-carbonaceous quartzite	
1002 TESTWORK	4.62	8.95	72.9	0.9	62.8	9.6	720	6.1	64.2	6.7	61.1	55.4	55.4	82.6	81.1	14.8		G3-Massive sulphide	
1002 TESTWORK	1.43	3.66	26.7	0.2	58.6	2.7			63.4	1.1			54.4		60.1				Composite of above

10.1.2 CONCENTRATOR OPERATIONS

The Faro mill was originally constructed in 1968 at a capacity of 5,000 tonnes per day. It was expanded on several occasions to its present capacity of 14,000 tonnes per day. The flowsheet consists of primary, secondary and tertiary crushing followed by rod and ball mill grinding to achieve an 80% passing 74 micron (200 mesh) product for flotation feed.

A lead rougher concentrate was produced which was reground in two stages before five cleaning stages are used to achieve a 60% Pb concentrate grade. Zinc was recovered from the lead rougher tailings using rougher flotation, followed by a single regrind of the zinc rougher concentrate before three stages of zinc cleaning. Operating results from 1987 through 1992 are shown on Table 4.

Concentrates were separately thickened, filtered and dried to approximately 7% moisture before being loaded into specially designed shipping containers for trucking to the port of Skagway, Alaska. Concentrates were transferred to a storage building prior to loading onto vessels for shipment to smelters in Europe and Japan.

There is no centralized process control system for the operation but an On Stream Analyzer provides timely assays for the manual control of the flotation circuits. As will be noted later, plans are in place to install a process control system. Although the original equipment is 25 years old it appears to be well maintained and should continue to operate satisfactorily for the remainder of the life of the mines.

Anvil Range's production schedule calls for tonnage throughputs of approximately 4.2 million tonnes per year. WGM has analyzed past production records and concluded that this tonnage rate is achievable, even when the harder Grum ore is treated. This tonnage rate, which is less than plant capacity, will allow for better equipment utilization and possibly higher recoveries since less down time will likely occur, which frequently can lead to metal losses.

Table 4

FARO CONCENTRATOR OPERATING RESULTS

YEAR	TONNES MILLED	HEADS				LEAD CIRCUIT								ZINC CIRCUIT				REMARKS
		%Pb	%Zn	Ag g/t	Au g/t	CONCENTRATE GRADE				%RECOVERY				GRADE		%RECOVERY		
						%Pb	%Zn	Ag g/t	Au g/t	Pb	Zn	Ag	Au	%Zn	Ag g/t	Zn	Ag	
1987	4,539,394	3.30	4.94	39.5		60.5		479			74.0		49		49.5		76.8	Faro ore
1988	4,125,873	3.81	4.88	53.8		58.3		559			78.5		51		49.0		76.1	Faro ore
1989	4,378,084	2.83	4.69	35.0		58.5		445			78.9		49		49.7		77.2	Faro ore
1990	4,714,033	3.01	4.89	38.8		59.0		489			78.3		49		50.3		76.8	Faro/Vangorda
1991	4,126,593	2.99	4.50	44.0		62.7		529			76.4		48		49.8		77.2	Faro/Vangorda 50/50
1992	4,548,744	3.20	4.58	44.3		62.4		621			77.8		56		49.8		76.1	Faro/Vangorda
1996 PLAN	4,200,000	5.39	3.25	50.9	0.75	62.0		631	6.3		80.0				52.0		78.0	Faro/Vangorda/Grum

Average mill heads ranged from 3.0 to 3.6% Pb and 4.5 to 4.9% Zn throughout the treatment of ore from the Faro and Vangorda deposits. This consistent feed grade was attributable to the blending of mill feed by addition of material from the stockpiles which assisted in the steady operation of the mill.

Both lead and zinc concentrate grades and recoveries have also been very consistent during the processing of ore from the Faro and Vangorda deposits.

In preparing our financial projections, lead and zinc recoveries of 70% while processing the cap rock from the Grum deposit, have been assumed. While this is higher than the Lakefield testwork recoveries of 63% and 60% for lead and zinc respectively for this material, we believe the higher recovery is justified as the testwork was open circuit flotation testwork rather than locked cycle testwork normally used to predict recoveries.

We believe that the concentrate grades and recoveries that have been forecast for the first year of production following the resumption of operations are conservative. Providing the extra lead regrind circuit is installed (this installation has been started) and performs to expectations, then the forecast results should be readily achievable.

Assuming that the proposed process control system is installed prior to plant startup in October 1995, we expect that lead recoveries in the lead concentrate should increase to 80% in the first year and to slightly above 80% in the second and following years. The zinc recoveries in the zinc concentrate will be in the range of 78% during 1996 and should increase to 80% in 1997 and 82% when the Dy ore is introduced into the circuit from 2003 onwards.

The redesign of the lead regrind circuit to achieve the finer grind required for Grum ore was engineered by Curragh personnel in conjunction with Kilborn Engineering. Computer simulations of the circuit were run and calculations of the expected performance of the various pieces of equipment were all in accordance with accepted engineering procedures. The equipment suppliers were involved in the design and sizing of the equipment.

This extra fine grind, as far as we are aware, is unique in the industry. As such, there may be a slight technological risk involved in that the design equations used may not apply to the fineness of grind to be used in this case. Also, careful attention to the operation of the plant will be required to attain the fineness of grind required. WGM believes however, that this is an acceptable risk and that the plant should meet the design assumptions.

Analysis of the concentrates produced from laboratory testwork and from a short plant test on Grum ore show that mercury continues to be the only element that would incur a penalty. The mercury content of the zinc concentrate is quite high but not at refusal limits.

Laboratory settling and filtration testing were carried out on the finer concentrates that will be produced from the revised grinding flowsheet. These tests showed that the existing facilities have sufficient capacity for filtering and drying the concentrate production, and WGM concurs. The drying capacity is more limited and will require the continued use of a drying agent.

10.1.3 TAILINGS DISPOSAL

Tailings were discharged into an impoundment area in the Rose Creek valley below the mill site until the end of 1992. Starting in December 1992, tailings were pumped to the depleted Faro pit where there is sufficient capacity to store the tailings from the treatment of Grum, Dy and remaining Vangorda ores and stockpiles.

When the Faro pit is full, water will be treated if required and recycled to the mill for reuse in the process. Limited testwork performed earlier at Lakefield showed that there was no apparent deleterious effect on plant operation. This is similar to the experience in other base metal operations.

10.2 DY

10.2.1 METALLURGICAL TESTING

Initial laboratory testwork performed in 1978 on Dy drill core samples indicated that fine grinding of the lead rougher concentrate was required to achieve saleable lead concentrate grades. In 1982, a more extensive testing program was performed at Kamloops Laboratories on diamond drill core representing the five predominant ore types in the deposit. While good metallurgical recoveries were achieved using the standard conditions of the Faro flowsheet, a finer primary grind to 80% passing 30 microns (compared to the Faro grind of 80% passing 70 microns) resulted in improved concentrate grades and recoveries. However the final grind for the production of satisfactory grades of lead and zinc concentrates are similar to those required at the Grum deposit.

The Bond Work Index testing showed that the samples from the Dy deposit were generally softer than Faro or Grum.

The concentrates produced were of good quality, with payable concentrations of gold and silver reporting to the lead concentrate. The zinc concentrates had mercury contents up to 500 ppm, which exceeds the limit for the 1993 smelter contracts of 350 ppm. When blended with the zinc concentrates produced from Grum ores, the mercury level will be at or below the 350 ppm level.

In 1992 a further test program was performed on samples from two drillholes from the deposit. The purpose of this work was to test the response of the Dy ore to the Faro flowsheet. This program showed that the samples were amenable to the Faro flowsheet but that the lead regrind requirements were less than for Grum ore. A grind of 80% passing 20 microns was sufficient for Dy lead concentrate. The use of soda ash in place of lime in the lead circuit improved the lead response.

Based on the overall results from these testwork programs, the Dy ores are amenable to the standard Faro flowsheet and may show better recoveries than the Grum ores.

11. PLANT AND INFRASTRUCTURE

11.1 GENERAL

In order to maintain the value of the property, the Receiver proceeded to place the property on a care-and-maintenance status. In the fall of 1993, limited funds were expended to winterize the site facilities. This consisted of draining all equipment, tanks and piping of water or process solutions. The fire protection system was also drained to prevent freezing and is presently inoperative.

The flowsheet of the Faro concentrator circuit consisted of a crushing facility comprising primary, secondary and tertiary crushing with intermediate screening stages. Intermediate storage is provided in the form of a 16,500 tonne capacity covered bulk storage facility. Five fine ore storage bins feed the four grinding circuits each consisting of a primary rod mill and a secondary ball mill.

A lead rougher concentrate is produced which is reground in two stages before five cleaning stages are utilised to produce 62% Pb grade concentrate. Zinc is recovered from the lead rougher tails using rougher flotation, followed by a single stage regrind before three stages of cleaning to produce a 52% grade concentrate.

Prior to suspension of operation in April 1993, two very important modifications were underway at the Faro concentrator; addition to the lead regrind circuit and the installation of a centralized process control system. These installations must be completed prior to plant startup in October 1995 as these installations are required to meet predicted metallurgical performance.

The zinc and lead concentrates are treated separately by thickening, filtering and drying in preparation for shipping. The concentrates are loaded in specially designed transportation containers for transportation by truck to the port of Skagway, Alaska. The concentrates are

stored in bulk form in a storage building before loading onto vessels for transportation by sea to smelters in Europe or Japan.

Support facilities consist of a coal burning heating plant, maintenance shops, warehouse, administration offices, tailings pumphouse and fresh water supply pumphouse.

As part of its due diligence for the preparation of this report, WGM arranged for a visit to the Faro property by one of its associates in September 1994 in order to:

- assess the current condition of the plant and facilities after they had been shut down for a period of 18 months; and
- identify any problems that could affect a resumption of operations.

The scope of the inspection was restricted to the mill site and support facilities, such as the water and electrical power supply to the mill and the tailings pipe line. It must be emphasized that the inspection was restricted to a visual appraisal, and no effort was made to start up any of the machinery.

11.2 ASSESSMENT OF CONDITION OF FACILITIES

11.2.1 STRUCTURES

The site buildings are in fairly good condition. Minor physical damage to the building cladding was noted, generally around the access doors. Minor roof leaks were noted on most structures which will not be detrimental to startup, with the exception of the area over the flotation lab in the mill building. Considerable damage has occurred to the interior finishes of the lab as a result of the roof leaks in this area.

The concentrate storage structure roof and wall cladding are in poor condition due to corrosion. The building structural steel appears to be in reasonable condition; however, a closer inspection should be carried out before new cladding is erected.

11.2.2 CRUSHING CIRCUIT

All processing equipment is intact and appears to be in fairly good condition requiring only normal servicing to be operable.

The basement area under the gyratory crusher has flooded. The area has been pumped out, but at the time of the site visit on September 17th, 1994, there was a metre of ice remaining on the lower floor from the previous winter. Heat will be needed in the building to thaw the ice to permit pumping.

Throughout the crushing section, spillage from conveyors and chutes was noted on the floors, walkways and operating platforms. It would appear that conveyor spillage and chute plugging were common occurrences during operations. Due to the several successive increases in capacity that have occurred during the life of this mill, it is possible that the system is running at or beyond the maximum limit of the equipment capacity.

If in fact the material handling system is operating under these circumstances, spills and plugged chutes can be expected, resulting in costly clean-ups. A study of the material handling system is recommended to determine the remedial action necessary to eliminate or at least minimize the spills.

The belt cleaning equipment presently installed on all belt conveyors is antiquated and inadequate, further compounding the spillage problem. Replacement of the existing belt scrapers with more efficient belt cleaning systems is recommended.

Based on the amount of dust evident around the crushing plant, it is reasonable to assume that the dust collection system presently in use is inefficient. A study of the existing dust collection system should be initiated to determine if the system can be brought up to an acceptable standard to satisfy the requirements of the regulatory bodies.

On a number of items of equipment, the safety guarding is inadequate to satisfy the governing codes and regulations. This must be rectified before production can commence.

Clean-up of the spilled ore throughout the crushing area is required to provide a safe working environment.

11.2.3 GRINDING CIRCUIT

The ten grinding mills located in the grinding area were "jacked-up" to take the loads off the trunnion bearings in the fall of 1993. Whether the weight of the mills plus the ball or rod charge on the trunnion bearings for the six months between shutdown and "jack-up" in the fall of 1993 has damaged the bearings can only be determined after a thorough inspection. All mills still contain the full charge of grinding media. It is possible that the charges have "frozen" in place and will likely require removal before the mills are started. This must be examined closely because if the charges are "frozen" at startup they could cause serious damage to the grinding mills.

Although the mill liners in most cases are showing signs of wear, there appears to be sufficient life remaining for start up purposes.

The grinding area basement floor is covered with dried slurry to a depth of between 0.6 and 1.2 m. As well, the above comments regarding the crushing area conveying system also apply to the fine ore bin feed conveyor system and the grinding mill feed conveyor system. All of this spill must be cleaned up prior to startup.

11.2.4 FLOTATION CIRCUIT

All flotation equipment appears to be in operable condition. The flotation cell tanks have been drained and generally contain minimal amounts of dried slurry.

The three regrind mills are resting on the trunnion bearings which will likely require

replacement. The mills still contain the full charge of grinding media which may have "frozen" in place. The charge will likely have to be removed in order to start the mills.

As well, the installation of the additional lead regrind mill should be completed. The foundations have been completed and the structural steel and equipment are on site.

The flotation area basement area has a considerable amount of slurry on the floor especially under the three regrind mills. A major clean-up of the area is required.

11.2.5 DEWATERING CIRCUITS

The equipment in this area appears to be in fairly good condition requiring only normal servicing to be operable.

The thickeners have been drained, but still contain the "bed" of solids which means that upon startup, little if any concentrate will be retained in this equipment.

The five drum filters utilised for dewatering the concentrates appear to require normal servicing and replacement of the filter cloth.

The dryers appear to require only normal servicing.

The lime storage bin is located in this area and a considerable amount of lime is evident throughout the area. An efficient dust collection system is required to eliminate the dispersal of lime throughout the area.

The area basement floor requires a major clean-up of spills.

11.2.6 CONCENTRATE HANDLING AND STORAGE AREA

The equipment in this area appears to require only normal servicing to be brought up to operable condition.

11.2.7 HEATING PLANT

The coal fired heating plant which provides the heat to dry the concentrates and to heat the main building is in fairly good condition.

11.2.8 REAGENT AREA

The reagent handling, storage, mixing and distribution systems appear to be in reasonably good condition, requiring only normal servicing to be operational. Some of the less stable chemicals, those likely to deteriorate with age and those subject to freezing have been removed.

11.2.9 TAILINGS PUMPHOUSE AND RECHARGE LINE

This installation is fairly new and all equipment is in excellent condition. The tailings line, which is routed to the Faro open pit, is also a fairly recent installation and appears to be in excellent condition.

11.2.10 WATER SUPPLY PUMPHOUSE

The deep well pumps have been dismantled as part of the winterization program completed last fall. The pumps and ancillary equipment appear in good condition, requiring only the normal servicing and assembly to be operable. The water supply line was drained and is ready for operation.

11.2.11 ELECTRICAL POWER SUPPLY

The main electrical sub-station is energized, and sufficient power for lighting purposes is available. All electrical systems appear operable, requiring only the normal inspections before being brought on-line.

The stand-by diesel generator is maintained on line and is test run on a regular basis.

11.2.12 WAREHOUSE AND ADMINISTRATION COMPLEX

This structure is in good condition, requiring only a minor clean-up to be placed back in operation. The telephone system and the computer systems require new back up batteries and servicing to be brought back on line.

The warehouse appears to be reasonably well stocked, although parts and components used since the shutdown have not been re-ordered.

The attached rebuild shop, machine shop and carpenter's shop are ready for operation and appear to contain the full complement of equipment and small tools.

The lab appears to be ready for operation. Some of the less stable chemicals and those likely to be damaged by freezing have been removed and destroyed. The Atomic Absorption (AA) machines which have been dismantled and stored will require installation and servicing.

11.2.13 TRUCK SHOP

The truck shop appears to be in good condition and is ready for operation.

12. ENVIRONMENTAL REVIEW

12.1 GENERAL

The operations of the previous operator, Curragh, were conducted under the authority of two water licences (the Water Licences) issued by the Yukon Territory Water Board (the Water Board) pursuant to the Northern Inland Waters Act (now the Yukon Waters Act) and Regulations, namely:

- the Rose Creek (Faro) Licence, covering the former Faro Mine (now worked out), expiring on January 30, 1997; and
- the Vangorda Creek Licence, covering the Vangorda, Grum and Dy properties, expiring on December 31, 2003.

It is anticipated that Anvil Range will shortly receive an effective assignment to it of all rights as licensee on the terms and conditions applicable to Curragh. Anvil Range will also be subject to environmental regulations pertaining to spill occurrences and cleanup.

12.2 FUNDING OF ENVIRONMENTAL CLOSURE LIABILITIES

In an agreement currently under negotiation with the Department of Indian Affairs and Northern Development (DIAND), Anvil Range will agree to create a Reclamation Security Trust (RST), which will fund its environmental closure liabilities. These liabilities comprise decommissioning and reclamation of mining and related activities on the Vangorda and Grum properties as well as the former Faro mine on an ongoing basis. Anvil Range's ongoing environmental management prior to the closure of the mines will be funded from operating cash flow.

The RST will be managed separately from the Faro operation. Together with existing security arrangements under the Water Licences, it will have a maximum contribution limit

of \$100 million, inclusive of interest.

The RST will be funded by a net smelter return (NSR) royalty. The rate of the NSR will be determined on a graduating scale based on prevailing zinc prices as noted in Section 5. It is anticipated that the value of the RST and existing security under the Water Licences will exceed \$100 million at the end of 12 years, based on Anvil Range's current mine plan, WGM's financial projections and an imputed rate of interest of 7%.

12.3 WGM REVIEW

In the course of our due diligence review of the Faro operations in January 1993, we examined the existing permits applicable to the Faro and Vangorda/Grum/Dy areas issued by the Yukon Water Board. These all appeared to be in order and we do not anticipate that Anvil Range will have any difficulties meeting the requirements for renewal.

In 1992, the Yukon Territorial Government completed hearings into the Faro site (Rose Creek) abandonment plan. This is an extensive plan involving:

- the collection of seepage from the sulphide mine waste dumps;
- partial reclaiming of the Rose Creek tailings area with the production and sale of a bulk sulphide concentrate defraying the cost of the pumping and reprocessing;
- flooding the remaining tailings area to reduce acid generation; and
- using the Faro open pit to store the tailings and reduce the potential for acid mine drainage from this source.

The host rock in which the Faro sulphide ore bodies are found is calcareous in nature and has a high potential for neutralizing any acid seepage that may be generated. The waste dumps at the Vangorda and Grum site were being designed by Curragh to take advantage of this feature. Sulphide waste was being encapsulated with the calcareous material to ensure that no seepage will occur in the future.

In 1993, all waste water was being processed through a treatment plant to ensure that the effluent from the site met the regulatory limits. With the exception of an occasional excursion of ammonia levels above the limits at the Faro site, the operation was able to meet the present regulatory limits for site effluents.

The fallback position for reclamation of the tailings area, should the reclamation of sulphides from the exposed section of the tailings not be feasible, involves the covering of the exposed tailings with crushed neutralizing waste and till.

13. TRANSPORTATION

Curragh had developed a unique and efficient transportation system for hauling the lead and zinc concentrates from the Faro district to tide water at Skagway, Alaska for storage and loading into vessels for shipment to the smelters. Anvil Range intends to manage the transportation of concentrates on a similar basis, and will continue to rely on independent trucking contractors. The tractors are the property of the contractor, while the trailers and pots belonging to Anvil Range. Anvil Range will handle the load-out operations at Faro, and could achieve economies of transportation in comparison with the past.

The concentrates (lead and zinc separately) will be loaded into containers (pots) at the concentrators, with each pot holding between 11 and 12 tonnes of concentrate. Four pots can be carried on a tractor trailer unit.

The distance from Faro to Skagway and return is approximately 1,000 km and transit time averages 19 hours. The highway between Whitehorse and Skagway generally follows the route of the prospectors of the 1898 gold rush and is well maintained. A staging and maintenance depot located in Whitehorse will enable drivers to change and/or break the trip.

At Skagway each pot will be picked up by a fork-lift truck with specially designed forks, moved to the designated area inside the storage building and turned upside down for emptying. Should concentrates stick to the pots due to freezing, a specially designed chain equipped cleaning system will be used to completely empty the pots prior to returning them to the trailers.

The existing facilities at Skagway include the storage shed, where concentrates can be blended, load-out facilities and a fixed shiploader with a capacity in the range of 800 to 1,000 tph. Sampling and weighing facilities are included in the system and the concentrates will be moved from the stockpiles to the load-out hoppers by means of front-end loaders.

The tractor trailer units are designed so that they can accommodate containers which are used to backhaul supplies required for the mining operations.

WGM has assumed that Anvil Range will rehabilitate the Skagway facilities and employ a contractor to operate the facilities.

14. CONTRACTS

14.1 INTRODUCTION

The lead and zinc concentrates produced at Faro will be trucked to the port of Skagway, Alaska for storage and subsequent ocean shipment to smelters.

Concentrate producers usually receive payment from the smelters based on metal prices quoted on the London Metal Exchange (LME), less smelter treatment charges and metal deductions, according to terms negotiated annually with each smelter. The smelters pay an amount equal to the payable metal contained in the concentrate multiplied by the average price during a quotational period, which is typically in the month following the month during which the vessel carrying the concentrate arrives at the receiving port.

In general, smelter treatment charges include a treatment charge set at a base price for the metal and a smelter participation component which increases or decreases as the price of the metal changes relative to its base price. The smelter treatment charge for zinc concentrate, and in some cases for lead concentrate, is reduced if the price of the metal falls below the base price.

For zinc concentrate, zinc is payable. The zinc payable metal, which is approximately 85% of the zinc contained in the zinc concentrate, is priced at the daily LME settlement price.

For the lead concentrate, lead, gold and silver are payable. The lead payable metal, approximately 95% of the lead contained in the lead concentrate, is priced daily at the LME settlement price. All lead smelters pay for gold and silver.

14.2 CUSTOMERS AND MARKETING

Concentrate from the Faro property has historically found acceptance among a diversified group of smelters in Europe, Asia, North Africa and Australia. Anvil Range is in the process of negotiating a Concentrate Financing Facility which will supply the holder(s) with a first call on an aggregate of 50% of the concentrates produced annually by Anvil Range to a maximum of 200,000 tonnes of concentrate per year. The quantities of lead and zinc concentrates will be taken in the proportions in which they are produced. The term of the Concentrate Financing Facility is expected to be seven years.

In its marketing of the remaining concentrates, Anvil Range or its marketing agents intend to approach substantially the same customer group as the previous operator. Major customers included Asturiana de Zinc, SA of Spain, Korea Zinc Company Ltd. of South Korea, Nuovo Samim SpA of Italy, and Toho Zinc Co., Ltd. of Japan. These companies accounted for over 75% of Curragh's total sales of lead and zinc concentrates in 1992. Anvil Range is currently in discussions with certain of these customers and selected marketing agents.

Key to the successful re-opening of the Faro property is the re-establishment of marketing offtake agreements with key smelters in Asia and Europe. The smelters to whom Curragh, the previous operator, sold substantially all of its lead and zinc concentrates are well known to the principals of Anvil Range, who had previously negotiated agreements with them.

Anvil Range is confident, therefore, that the placement of concentrates from the Faro property will not be difficult on terms that are attractive to the company. Anvil Range's marketing activities will be managed through an office in Toronto. WGM agrees that on the basis of past experience of Anvil Range's management in dealing with smelter contracts, these negotiations can be completed successfully.

15. FINANCIAL EVALUATION

15.1 GENERAL

WGM used the Discounted Cash Flow approach in its evaluation of the Faro project. In this approach, projected cash flows are discounted by an appropriate factor. Cash flow is operating profit less taxes plus non-cash charges to income such as depreciation, less estimated future capital expenditures to determine Net Present Value.

15.2 CAPITAL COSTS

The following table outlines Anvil Range's anticipated capital expenditure program and the funds required from completion of project financing to September 30, 1995:

TABLE 5
CAPITAL EXPENDITURES

Item	\$ Millions
Mine startup, equipment and repairs	\$20.1
Preproduction stripping	31.3
Evaluation and closing costs	5.2
Mill and mill startup	15.0
Environmental bond	2.1
Other	<u>1.3</u>
Total	75.0

The expenditure of \$31.3 million for preproduction stripping will be incurred in 1995.

WGM has reviewed these costs and believes they are a reasonable estimate of the funds required to place the Faro lead-zinc deposits back into operation. Replacement capital will be required on a continuing basis during the operating period.

In addition, approximately \$40 million will be required in years 2000 and 2001 to develop the Dy deposit. Sustaining capital of approximately \$28 million for equipment replacement over the life of the operation has been included.

15.3 OPERATING COSTS

Following is a summary of operating costs exclusive of shipping and reclamation on an annual basis for the initial 10 years of operation:

Fiscal Year (October through September)	\$/tonne
1996	\$29.93
1997	28.20
1998	26.26
1999	27.88
2000	22.78
2001	20.73
2002	29.38
2003	41.00
2004	56.86
2005	56.86
Average	29.76

The higher costs for the period 2002-2005 are related to the fact that the Dy underground mine is in production. The Grum deposit is depleted by the year 2003, and in the last two years of operation all of the production will come from Dy.

These costs were prepared by Anvil Range and reviewed by WGM. We believe they are reasonable assumptions.

15.4 ASSUMPTIONS FOR CASH FLOWS

In preparing the cash flows included in Appendix A, WGM made the following assumptions:

- The purchase price of the property is \$28 million, including the Receiver's expenses.
- New equity investment at the time of closing comprises the following amounts:

Korean Group	\$25,000,000
Canadian Institutional Investors	25,000,000
Flow Through Special Shares	<u>25,000,000</u>
Total	\$75,000,000

\$3.75 million of the above amount is applied to corporate and financing expenses.

- Additional capital will be raised through various financing arrangements, as follows:

Concentrate Financing Facility	C\$15,000,000
Equipment Lease	C\$9,400,000
Operating Loan	C\$20,000,000

- Accounts Receivable: Equivalent to the value of three months of net smelter return from the sale of concentrates.
- Accounts Payable: Equivalent to 5% of operating costs.

- **Zinc Smelter Terms:** Payment is received for 85% of the contained zinc, with a minimum deduction of 8 units.

Treatment charges are US\$185 per tonne of concentrate, plus a participation charge of US\$0.135 for each dollar that the LME zinc price exceeds US\$1,000 per tonne.

Lead Smelter Terms:

Payment is received for 95% of the contained lead with a minimum deduction of three units.

Treatment charges are US\$145 per tonne of concentrate plus a participation charge of US\$2.50 for each US\$0.01 that the lead price exceeds US\$0.24 per pound.

Silver refining charge - US\$0.30 per ounce.

Gold refining charge - US\$0.25 per gram.

Marketing Charges:

2.5% of NSR for zinc concentrate and 3.0% for lead concentrate.

Reclamation Security Trust:

A fund will be set up to finance environmental closure liabilities on the Vangorda, Grum and Faro mines on an ongoing basis.

The fund will be financed by a royalty on the net smelter return and the royalty rate is based on the price of zinc.

At a zinc price of less than US\$0.50 per pound, the rate is 0%. At a zinc price between US\$0.50 and US\$0.55 per pound, the rate rises from 0.25% to 2.5%. At a zinc price between US\$0.55 and US\$0.75 per pound, the rate is 3%. At a zinc price in excess of US\$0.75 per pound, the royalty rate increases to 4% for the first 6 years of operation; then it decreases to 3% for any subsequent years of operation.

Cash Flow Projections:

All dollar amounts in the cash flow projections are expressed in Canadian dollars. The Exchange Rate used is C\$1.00 = US\$0.75. Inflation has not been included.

Financial projections were developed for three cases, as follows:

Base Case: Zinc prices ranged from US\$0.55 to US\$0.65 per pound.

Case 2: The zinc price capped at US\$0.60 per pound.

Case 3: Zinc prices ranged from US\$0.39 to US\$0.77 cents per pound.

Case 3 is based on a forecast of zinc prices and treatment charges for the period 1996-2005 by a leading base metal marketing analyst. We have used these prices and charges in Case 3 to verify the results of the Base Case and Case 2.

In all three cases, the lead price was held at US\$0.28 per pound and the silver price at US\$5.50 per ounce.

Taxes: All relevant federal and Yukon corporate taxes and Yukon mining duties have been included in the financial projections. Anvil Range has advised us that they will be able to use \$136 million in tax pools previously accumulated by Curragh. We have included these pools in our calculation of taxes.

Tonnes Mined: Although mineable reserves in stockpiles, the Vangorda deposit and the Grum deposit total 37.753 million tonnes, the total tonnage mined over the 10-year period covered by the cash flow model is 32.982 million tonnes. The reason for this is that the cash flow model is restricted to a 10-year period, at the end of which there is still some 4.58 million tonnes remaining in the Dy deposit.

15.5 FINANCIAL ANALYSIS

Net Present Values (NPVs) of the accumulative net cash flows were calculated at discount rates of 5%, 10% and 15% and are summarized in Table 6. Details are included in Appendix A.

TABLE 6
FARO PROPERTY - NET PRESENT VALUE
\$ MILLION

Discount Rate	Case 1		
	Base	Case 2	Case 3
	Zinc Prices US\$0.55 to US\$0.65	Zinc Price Capped at US\$0.60/lb	Varying Zinc Prices Independent Forecast
5%	279.3	255.6	266.5
10%	216.7	201.1	212.6
15%	172.6	162.5	173.4

16. CONCLUSIONS AND RECOMMENDATIONS

16.1 CONCLUSIONS AND RECOMMENDATIONS

- Assuming the metal prices used in the base case, i.e. zinc prices of US\$0.55 to US\$0.65 per pound, the Faro operation will provide a positive cash flow, an attractive net present value (NPV) and an internal rate of return of 33%.
- Mothballing and winterizing of the plant equipment and facilities were reasonably well done, and little difficulty should be encountered in rehabilitating the operation.
- Startup of the plant should go smoothly.

16.2 RECOMMENDATIONS

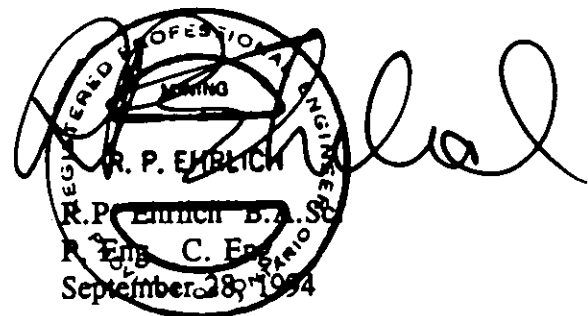
- Prior to startup, a thorough cleanup must be carried out of the crushing and process plants.
- The concentrator improvements, including zinc circuit high intensity conditioning, additional lead regrind mill and centralized process control system must be completed before startup to achieve predicted metallurgical results.
- Modifications to the materials handling system in the crushing plant are required to reduce spills.

CERTIFICATE

To accompany the report entitled
"A Review of the Faro Lead-Zinc Property, Yukon Territory
for Anvil Range Mining Corporation"
Dated September 28, 1994

I, Reinhart Paul Ehrlich, do hereby certify that:

1. I reside at 35 Pitcairn Crescent in North York, Ontario, M4A 1P5.
2. I graduated from the University of Toronto with a Bachelor of Applied Science degree in Metallurgical Engineering in 1946.
3. I am a registered Professional Engineer and a Designated Consulting Engineer with the Professional Engineers Ontario, a member of the Order of Engineers of the Province of Quebec and a Chartered Engineer in the U.K.
4. I have practised my profession for over 48 years and my experience includes plant operation, plant design and project evaluation.
5. I am a Vice President of Watts, Griffis and McOuat Limited where I have been employed for over nine years.
6. I visited the Faro property in January, 1993 and have reviewed various reports presented to us by Curragh and Anvil Range Mining Corporation.
7. The report was prepared under my direction and I participated in the preparation of the conclusions and recommendations.
8. I do not own, directly or indirectly, nor do I expect to receive any direct or indirect interest in the properties described in this report nor in the securities of Anvil Range Mining Corporation or any associated or affiliated company which has a financial interest in the properties.



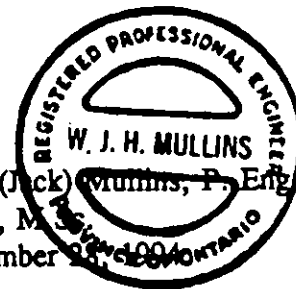
CERTIFICATE

To accompany the report entitled
**"A Review of the Faro Lead-Zinc Property, Yukon Territory
for Anvil Range Mining Corporation"**
Dated September 28, 1994

I, Jack Mullins, do hereby certify that:

1. I reside at 195 Jenny Wrenway, Willowdale, Ontario, Canada, M2H 2Z3 and that I am a registered professional engineer with the Professional Engineers Ontario (1975).
2. I am a graduate of Memorial University of Newfoundland with an M.Sc. degree in Geology (1961) and I have practised my profession for the past 33 years.
3. I am an employee of Watts, Griffis and McOuat Limited, a firm of consulting geologists and engineers which has been authorized to practise professional engineering by the Professional Engineers Ontario.
4. I visited the Faro property in January, 1993.
5. This report is also based on material made available by Anvil Range Mining Corporation.
6. I do not own, directly or indirectly, nor do I expect to receive any direct or indirect interest in the property described in this report, nor do I beneficially own, directly or indirectly, any securities of Anvil Range Mining Corporation, or any associated or affiliated company.

W.J. (Jack) Mullins, P. Eng.
B.Sc., M.Sc.
September 28, 1994



SOURCES OF INFORMATION

Curragh Resources Inc.

- 1991 Dy Deposit Mineral Inventory, Report #WH9103, 34 p., with some but not all of the Appendices; December.
- 1992 Inter-Office Memorandum to Graham Clow from Gregg Jilson, Re: South Cirque Mineral Inventory - Additional Potential at Up Dip End, Dated 03 22 1992, 4 pages of text plus, a figure, tables and an appendix.

Whitehorse Division Transportation Department

- 1992 1991 Annual Information Form; March.
- 1991 Faro Decommissioning, Overview of the Environmental Plans, Report #WH9108; December.

Curragh Inc.

- 1992 Faro Operations 1993 Budget; November.
- 1992 Third Quarter Report
- 1993/1997 Operating Plan, Faro Division

Canadian Mine Development

- 1992 Dy Project Exploration Shaft & Development Cost Estimate, Draft; December.

Metal Bulletin Research

- 1993 The Outlook for the Zinc Market to the year 2000; January.

1993 The Outlook for the Lead Market to the year 2000; January.

The Northern Miner Magazine

1992 The Curragh Story; May.

Curragh Resources Inc.

Blending of Zinc Concentrate, Concentrate Handling Port of Skagway, Alaska.

Lakefield Research

1991 Mineralogical Examination of Grum Samples submitted by Curragh Resources Limited, Progress Report No. 1, Project No. L.R. 4135; July.

1990 An Investigation of The Recovery of Lead and Zinc from Grum Ore Samples submitted by Curragh Resources, Progress Report No. 3, Project No. L.R. 3733; January.

1992 An Investigation of The Recovery of Lead, Zinc, and Silver from Dy Ore Samples submitted by Curragh Resources, Progress Report No. 1, Project No. L.R. 4335; September.

Curragh Inc.

1992 Interoffice Memorandum, to G. McDonald, from G.A. Jilson, Re: Dy Metallurgical Samples; 06 19 1992.

**APPENDIX A
CASH FLOW CALCULATIONS**

Base Case Metal Prices

Anvil Range Mining Corporation
(CND\$ thousands)

		Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Metal Prices														
Zinc	(US\$/lb)	-	-	0.55	0.60	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.65	0.64
Lead	(US\$/lb)	-	-	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28
Silver	(US\$/oz)	-	-	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50
Gold	(US\$/oz)	-	-	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00
US:Canada Rate		1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33
Production														
Grum/Vangorda/Stockpiles														
Waste Mined	(kt)	-	22,500	29,989	27,000	27,000	24,000	12,280	6,882	5,779	962	-	-	156,392
Ore Mined	(kt)	-	-	4,200	4,200	4,200	4,200	4,200	3,028	3,221	913	-	-	28,162
Grade - zinc	(%)	-	-	5.30	4.71	3.37	5.25	4.30	3.10	4.30	4.25	-	-	4.38
- lead	(%)	-	-	3.25	2.96	1.93	3.24	2.72	1.83	2.56	2.59	-	-	2.68
- silver	(g/t)	-	-	50.93	45.00	28.50	53.80	45.30	29.40	44.30	45.50	-	-	43.04
- gold	(g/t)	-	-	0.75	0.64	0.36	0.82	0.84	0.52	0.81	0.88	-	-	0.69
Dy														
Ore Mined	(kt)	-	-	-	-	-	-	-	241	979	1,200	1,200	1,200	4,820
Grade - zinc	(%)	-	-	-	-	-	-	-	6.62	6.62	6.62	6.62	6.62	6.62
- lead	(%)	-	-	-	-	-	-	-	5.50	5.50	5.50	5.50	5.50	5.50
- silver	(g/t)	-	-	-	-	-	-	-	66.30	66.30	66.30	66.30	66.30	66.30
- gold	(g/t)	-	-	-	-	-	-	-	0.68	0.68	0.68	0.68	0.68	0.68
Mill Schedule														
Ore Milled	(kt)	-	-	4,200	4,200	4,200	4,200	4,200	3,269	4,200	2,113	1,200	1,200	32,982
Grade - zinc	(%)	-	-	5.30	4.71	3.37	5.25	4.30	3.36	4.84	5.60	6.62	6.62	4.71
- lead	(%)	-	-	3.25	2.96	1.93	3.24	2.72	2.10	3.25	4.24	5.50	5.50	3.09
- silver	(g/t)	-	-	50.93	45.00	28.50	53.80	45.30	32.12	49.43	57.31	66.30	66.30	46.44
- gold	(g/t)	-	-	0.75	0.64	0.36	0.82	0.84	0.53	0.78	0.77	0.68	0.68	0.68
Recovery - Zinc	(%)	-	-	78.0	80.0	79.0	80.0	80.0	80.0	80.0	82.0	82.0	82.0	79.9
- Lead	(%)	-	-	80.0	81.0	80.0	81.0	81.0	81.0	81.0	82.0	82.0	82.0	80.9
- Silver	(%)	-	-	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0
- Gold	(%)	-	-	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0
Zinc Concentrate														
Production	(t)	-	-	333,900	298,596	215,032	332,830	272,604	165,789	306,887	182,941	122,907	122,907	2,354,395
Zinc Grade	(%)	-	-	52.0	53.0	52.0	53.0	53.0	53.0	53.0	53.0	53.0	53.0	52.7
Net Value		-	-	140,159	143,991	109,541	175,908	144,077	87,623	162,197	96,689	64,959	64,959	1,190,103
Lead Concentrate														
Production	(t)	-	-	176,129	158,581	102,933	172,226	144,585	86,921	172,508	114,860	84,563	84,563	1,297,869
Grade - Lead	(%)	-	-	62.0	63.5	63.0	64.0	64.0	64.0	64.0	64.0	64.0	64.0	63.6
Grade - Silver	(g/t)	-	-	631.5	619.7	604.7	682.2	684.3	628.2	625.8	548.3	489.2	489.2	623.0
Grade - Gold	(g/t)	-	-	6.3	5.9	5.1	7.0	8.5	7.0	6.6	4.9	3.4	3.4	6.3
Net Value		-	-	85,251	77,437	48,300	89,831	78,849	44,345	86,989	53,063	36,017	36,017	636,099
Total Smelter Return		-	-	225,410	221,428	157,841	265,740	222,926	131,969	249,186	149,752	100,976	100,976	1,826,202
Less: Ocean Freight		-	-	16,576	14,858	10,334	16,414	13,559	8,213	15,580	9,679	6,743	6,743	118,699
Marketing Commissions		-	-	7,110	6,947	4,877	8,141	6,747	4,050	7,743	4,816	3,358	3,358	57,148
Net Smelter Return		-	-	201,723	199,623	142,630	241,184	202,621	119,706	225,863	135,257	90,875	90,875	1,650,355

Base Case Metal Prices

Anvil Range Mining Corporation
(CND\$ thousands)

	Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Operating Costs													
Grum/Vangorda/Stockpile													
Mining - Waste	-	-	41,685	37,530	37,530	33,360	17,069	9,566	8,033	1,337	-	-	186,110
- Ore	-	-	11,550	11,550	11,550	11,550	11,550	8,327	8,858	2,511	-	-	77,446
Milling	-	-	31,416	31,416	31,416	31,416	31,416	22,649	24,093	6,829	-	-	210,652
G&A	-	-	10,164	10,164	10,164	10,164	10,164	7,328	7,795	2,209	-	-	68,152
Environmental	-	-	1,050	1,050	1,050	1,050	1,050	757	805	228	-	-	7,041
Subtotal	-	-	95,865	91,710	91,710	87,540	71,249	48,627	49,584	13,115	-	-	549,400
DY													
Ore Mining	-	-	-	-	-	-	-	603	30,593	37,500	37,500	37,500	143,696
Milling	-	-	-	-	-	-	-	1,959	7,949	9,744	9,744	9,744	39,140
G&A	-	-	-	-	-	-	-	1,688	6,853	8,400	8,400	8,400	33,741
Environmental	-	-	-	-	-	-	-	92	372	456	456	456	1,832
Subtotal	-	-	-	-	-	-	-	4,342	45,767	56,100	56,100	56,100	218,409
Reclamation Security Trust	-	-	6,052	5,989	4,279	7,236	6,079	3,591	6,776	4,058	2,726	2,726	49,511
Concentrate Haulage & Handling	-	-	29,837	26,745	18,601	29,546	24,406	14,784	28,045	17,421	12,137	12,137	213,657
Interest Expense	-	1,495	3,490	3,257	2,455	1,576	991	352	182	-	-	-	13,797
Total Operating Cost	-	1,495	135,243	127,701	117,044	125,897	102,724	71,696	130,353	90,694	70,963	70,963	1,044,774
Cash Operating Profit	-	(1,495)	66,480	71,922	25,586	115,287	99,896	48,010	95,510	44,563	19,911	19,911	605,581
Less: Federal Corp. Taxes	-	-	-	-	-	15,599	8,654	4,383	19,375	8,589	3,373	3,455	63,428
Yukon Corp. Taxes	-	-	-	-	-	8,113	4,501	2,280	10,077	4,467	1,754	1,797	32,989
Yukon Mining Duties	-	-	1,727	6,400	727	9,415	7,779	1,234	4,396	1,317	179	188	33,362
Cash Profit after Taxes	-	(1,495)	64,753	65,522	24,859	82,160	78,961	40,113	61,662	30,191	14,605	14,471	475,802
Cash Flow Calculation													
Cash Profit after Taxes	-	(1,495)	64,753	65,522	24,859	82,160	78,961	40,113	61,662	30,191	14,605	14,471	475,802
Plus: Concentrate Facility	-	15,000	-	-	-	-	-	-	-	-	-	-	15,000
Line of Credit	-	10,000	10,000	-	-	-	-	-	-	-	-	-	20,000
Equipment Leases	-	9,400	-	-	-	-	-	-	-	-	-	-	9,400
Partner Loan	500	-	-	-	-	-	-	-	-	-	-	-	500
Net New Equity Investment	71,250	-	-	-	-	-	-	-	-	-	-	-	71,250
Less: Purchase Property	33,250	-	-	-	-	-	-	-	-	-	-	-	33,250
Capital Investment	2,100	67,700	5,500	5,000	5,000	5,000	1,000	1,000	1,450	3,000	3,000	3,000	102,750
Dy Development	-	-	-	-	-	-	20,000	20,000	-	-	-	-	40,000
Changes in Working Capital	-	(75)	43,743	(148)	(13,715)	24,196	(8,482)	(19,177)	23,606	(20,669)	(10,109)	(19,170)	-
Stores and Inventory	-	-	5,000	-	-	-	-	-	-	-	-	-	-
Repay Concentrate Facility	-	-	1,733	1,855	1,984	2,123	2,272	2,431	2,601	-	-	(5,000)	-
Repay Line of Credit	-	-	3,276	3,604	3,964	4,360	4,796	-	-	-	-	-	15,000
Lease Payments	-	-	2,840	3,124	3,436	-	-	-	-	-	-	-	20,000
Repay Partner Loan	-	500	-	-	-	-	-	-	-	-	-	-	9,400
Net Cash Flow to Project	36,400	(35,220)	12,660	52,088	24,190	46,480	59,375	35,860	34,005	47,859	21,714	35,641	371,052
Accum. NCF to Project	36,400	1,180	13,840	65,928	90,118	136,598	195,973	231,833	265,837	313,697	335,411	371,052	371,052
PV of Accum. NCF disc. at 5X	36,400	2,029	13,795	59,902	80,295	117,612	163,013	189,127	212,711	244,324	257,984	279,337	279,337
PV of Accum. NCF disc. at 10X	36,400	2,819	13,793	54,837	72,166	102,435	137,586	156,886	173,524	194,812	203,592	216,694	216,694
PV of Accum. NCF disc. at 15X	36,400	3,557	13,823	50,551	65,382	90,164	117,691	132,148	144,069	158,658	164,414	172,629	172,629
Project IRR (%)	-	-	-	-	4.1	17.5	26.0	28.9	30.8	32.4	32.9	33.4	33.4

Base Case Metal Prices

Anvil Range Mining Corporation
Smelter Schedules
(Canadian \$000's)

		Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Zinc Concentrate														
Concentrate Shipped	(Tonnes)	-	-	333,900	298,596	215,032	332,830	272,604	165,789	306,887	182,941	122,907	122,907	2,354,395
Zinc Grade	(%)	-	-	52.0	53.0	52.0	53.0	53.0	53.0	53.0	53.0	53.0	53.0	52.7
Contained Zinc	(M lbs)	-	-	382.8	348.9	246.5	388.9	318.5	193.7	358.6	213.8	143.6	143.6	2,737.7
Payable Zinc	(US\$/t)	-	-	533.51	595.24	630.52	644.85	644.85	644.85	644.85	644.85	644.85	644.85	621.46
Less: Smelter Charge	(US\$/t)	-	-	213.69	228.57	243.45	243.45	243.45	243.45	243.45	243.45	243.45	243.45	237.77
Mercury Penalty	(US\$/t)	-	-	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00
Shipping	(US\$/t)	-	-	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	5.00
Net per Tonne Zinc Conc.	(US\$/t)	-	-	282.32	329.17	349.56	363.89	363.89	363.89	363.89	363.89	363.89	363.89	346.19
Total Zinc Conc. Revenue	(\$US 000's)	-	-	94,267	98,289	75,167	121,114	99,198	60,329	111,674	66,571	44,725	44,725	815,063
	(\$CND 000's)	-	-	125,690	131,052	100,223	161,486	132,264	80,439	148,898	88,761	59,633	59,633	1,086,750
Lead Concentrate														
Concentrate Shipped	(Tonnes)	-	-	176,129	158,581	102,933	172,226	144,585	86,921	172,508	114,860	84,563	84,563	1,297,869
Lead Grade	(%)	-	-	62.0	63.5	63.0	64.0	64.0	64.0	64.0	64.0	64.0	64.0	63.6
Silver Grade	(g/t)	-	-	631.5	619.7	604.7	682.2	684.3	628.2	625.8	548.3	489.2	489.2	623.0
Gold Grade	(g/t)	-	-	6.3	5.9	5.1	7.0	8.5	7.0	6.6	4.9	3.4	3.4	6.3
Contained Lead	(M lbs)	-	-	240.7	222.0	143.0	243.0	204.0	122.6	243.4	162.1	119.3	119.3	1,818.5
Contained Silver	(Kilos)	-	-	111,231	98,280	62,244	117,499	98,935	54,608	107,951	62,973	41,371	41,371	808,623
Contained Gold	(Kilos)	-	-	1,103	941	529	1,205	1,235	609	1,146	567	286	286	8,161
Payable - Lead	(US\$/t)	-	-	363.58	372.38	369.45	375.31	375.31	375.31	375.31	375.31	375.31	375.31	372.90
- Silver	(US\$/t)	-	-	100.21	98.23	95.70	108.73	109.07	99.66	99.24	86.22	76.31	76.31	97.21
- Gold	(US\$/t)	-	-	60.88	57.09	47.93	69.43	87.27	69.45	65.33	45.54	27.52	27.52	58.92
	(US\$/t)	-	-	524.67	527.70	513.08	553.47	571.65	544.42	539.88	507.07	479.13	479.13	529.03
Less: Smelter Charge	(US\$/t)	-	-	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00
Silver Refining	(US\$/t)	-	-	5.47	5.36	5.22	5.93	5.95	5.44	5.41	4.70	4.16	4.16	5.30
Gold Refining	(US\$/t)	-	-	1.18	1.11	0.93	1.35	1.70	1.35	1.27	0.89	0.53	0.53	1.15
Shipping	(US\$/t)	-	-	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50
Net per Tonne Lead Conc.	(US\$/t)	-	-	330.52	333.73	319.43	358.69	376.51	350.14	345.70	313.99	286.94	286.94	335.08
Total Lead Conc. Revenue	(\$US 000's)	-	-	58,214	52,924	32,880	61,776	54,437	30,434	59,635	36,064	24,264	24,264	434,893
	(\$CND 000's)	-	-	77,619	70,565	43,840	82,368	72,583	40,579	79,514	48,086	32,352	32,352	579,858
Smelter Return	(\$CND 000's)	-	-	208,834	206,569	147,507	249,325	209,367	123,756	233,606	140,073	94,233	94,233	1,707,503
Less: Marketing Commissions	(\$CND 000's)	-	-	7,110	6,947	4,877	8,141	6,747	4,050	7,743	4,816	3,358	3,358	57,148
Net Smelter Return	(\$CND 000's)	-	-	201,723	199,623	142,630	241,184	202,621	119,706	225,863	135,257	90,875	90,875	1,650,355

US Zinc Price held to \$0.60/lb

Anvil Range Mining Corporation
(CND\$ thousands)

		Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Metal Prices														
Zinc	(US\$/lb)	-	-	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60	0.60
Lead	(US\$/lb)	-	-	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28
Silver	(US\$/oz)	-	-	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50
Gold	(US\$/oz)	-	-	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00
US:Canada Rate		1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33
Production														
Grum/Vangorda/Stockpiles														
Waste Mined	(kt)	-	22,500	29,989	27,000	27,000	24,000	12,280	6,882	5,779	962	-	-	156,392
Ore Mined	(kt)	-	-	4,200	4,200	4,200	4,200	4,200	3,028	3,221	913	-	-	28,162
Grade - zinc	(%)	-	-	5.30	4.71	3.37	5.25	4.30	3.10	4.30	4.25	-	-	4.38
- lead	(%)	-	-	3.25	2.96	1.93	3.24	2.72	1.83	2.56	2.59	-	-	2.68
- silver	(g/t)	-	-	50.93	45.00	28.50	53.80	45.30	29.40	44.30	45.50	-	-	43.04
- gold	(g/t)	-	-	0.75	0.64	0.36	0.82	0.84	0.52	0.81	0.88	-	-	0.69
Dy														
Ore Mined	(kt)	-	-	-	-	-	-	-	241	979	1,200	1,200	1,200	4,820
Grade - zinc	(%)	-	-	-	-	-	-	-	6.62	6.62	6.62	6.62	6.62	6.62
- lead	(%)	-	-	-	-	-	-	-	5.50	5.50	5.50	5.50	5.50	5.50
- silver	(g/t)	-	-	-	-	-	-	-	66.30	66.30	66.30	66.30	66.30	66.30
- gold	(g/t)	-	-	-	-	-	-	-	0.68	0.68	0.68	0.68	0.68	0.68
Mill Schedule														
Ore Milled	(kt)	-	-	4,200	4,200	4,200	4,200	4,200	3,269	4,200	2,113	1,200	1,200	32,982
Grade - zinc	(%)	-	-	5.30	4.71	3.37	5.25	4.30	3.36	4.84	5.60	6.62	6.62	4.71
- lead	(%)	-	-	3.25	2.96	1.93	3.24	2.72	2.10	3.25	4.24	5.50	5.50	3.09
- silver	(g/t)	-	-	50.93	45.00	28.50	53.80	45.30	32.12	49.43	57.31	66.30	66.30	46.44
- gold	(g/t)	-	-	0.75	0.64	0.36	0.82	0.84	0.53	0.78	0.77	0.68	0.68	0.68
Recovery - Zinc														
- Lead	(%)	-	-	78.0	80.0	79.0	80.0	80.0	80.0	80.0	82.0	82.0	82.0	79.9
- Silver	(%)	-	-	80.0	81.0	80.0	81.0	81.0	81.0	81.0	82.0	82.0	82.0	80.9
- Gold	(%)	-	-	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0
- Zinc	(%)	-	-	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0
Zinc Concentrate														
Production	(t)	-	-	333,900	298,596	215,032	332,830	272,604	165,789	306,887	182,941	122,907	122,907	2,354,395
Zinc Grade	(%)	-	-	52.0	53.0	52.0	53.0	53.0	53.0	53.0	53.0	53.0	53.0	52.7
Net Value		-	-	155,126	143,991	99,901	160,499	131,457	79,948	147,989	88,219	59,269	59,269	1,125,669
Lead Concentrate														
Production	(t)	-	-	176,129	158,581	102,933	172,226	144,585	86,921	172,508	114,860	84,563	84,563	1,297,869
Grade - Lead	(%)	-	-	62.0	63.5	63.0	64.0	64.0	64.0	64.0	64.0	64.0	64.0	63.6
Grade - Silver	(g/t)	-	-	631.5	619.7	604.7	682.2	684.3	628.2	625.8	548.3	489.2	489.2	623.0
Grade - Gold	(g/t)	-	-	6.3	5.9	5.1	7.0	8.5	7.0	6.6	4.9	3.4	3.4	6.3
Net Value		-	-	85,251	77,437	48,300	89,831	78,849	44,345	86,989	53,063	36,017	36,017	636,099
Total Smelter Return														
Less: Ocean Freight		-	-	240,377	221,420	140,202	250,331	210,305	124,293	234,978	141,282	95,286	95,286	1,761,767
Marketing Commissions		-	-	16,576	14,858	10,334	16,414	13,559	8,213	15,580	9,679	6,743	6,743	118,699
Net Smelter Return		-	-	7,485	6,947	4,636	7,756	6,431	3,858	7,388	4,604	3,216	3,216	55,537
		-	-	216,317	199,623	133,232	226,160	190,315	112,222	212,010	126,999	85,327	85,327	1,587,532

US-Zinc Price held to \$0.60/lb

Anvil Range Mining Corporation
(CND\$ thousands)

	Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Operating Costs													
Grum/Vangorda/Stockpile													
Mining - Waste	-	-	41,685	37,530	37,530	33,360	17,069	9,566	8,033	1,337	-	-	186,110
- Ore	-	-	11,550	11,550	11,550	11,550	11,550	8,327	8,858	2,511	-	-	77,446
Milling	-	-	31,416	31,416	31,416	31,416	31,416	22,649	24,093	6,829	-	-	210,652
G&A	-	-	10,164	10,164	10,164	10,164	10,164	7,328	7,795	2,209	-	-	68,152
Environmental	-	-	1,050	1,050	1,050	1,050	1,050	757	805	228	-	-	7,041
Subtotal	-	-	95,865	91,710	91,710	87,540	71,249	48,627	49,584	13,115	-	-	549,400
DY													
Ore Mining	-	-	-	-	-	-	-	603	30,593	37,500	37,500	37,500	143,696
Milling	-	-	-	-	-	-	-	1,959	7,949	9,744	9,744	9,744	39,140
G&A	-	-	-	-	-	-	-	1,688	6,853	8,400	8,400	8,400	33,741
Environmental	-	-	-	-	-	-	-	92	372	456	456	456	1,832
Subtotal	-	-	-	-	-	-	-	4,342	45,767	56,100	56,100	56,100	218,409
Reclamation Security Trust	-	-	6,490	5,989	3,997	6,785	5,709	3,367	6,360	3,810	2,560	2,560	47,626
Concentrate Haulage & Handling	-	-	29,837	26,745	18,601	29,546	24,406	14,784	28,045	17,421	12,137	12,137	213,657
Interest Expense	-	1,495	3,490	3,257	2,455	1,576	991	352	182	-	-	-	13,797
Total Operating Cost	-	1,495	135,681	127,701	116,762	125,446	102,355	71,471	129,938	90,446	70,797	70,797	1,042,889
Cash Operating Profit	-	(1,495)	80,636	71,922	16,470	100,714	87,960	40,751	82,073	36,553	14,530	14,530	544,643
Less: Federal Corp. Taxes	-	-	-	-	-	12,447	7,163	2,813	16,468	6,856	2,209	2,291	50,247
Yukon Corp. Taxes	-	-	-	-	-	6,474	3,725	1,463	8,565	3,566	1,149	1,192	26,134
Yukon Mining Duties	-	-	3,275	6,400	165	7,561	6,110	849	3,211	882	11	16	28,480
Cash Profit after Taxes	-	(1,495)	77,361	65,522	16,305	74,232	70,962	35,626	53,828	25,249	11,161	11,030	439,782
Cash Flow Calculation													
Cash Profit after Taxes	-	(1,495)	77,361	65,522	16,305	74,232	70,962	35,626	53,828	25,249	11,161	11,030	439,782
Plus: Concentrate Facility	-	15,000	-	-	-	-	-	-	-	-	-	-	15,000
Line of Credit	-	10,000	10,000	-	-	-	-	-	-	-	-	-	20,000
Equipment Leases	-	9,400	-	-	-	-	-	-	-	-	-	-	9,400
Partner Loan	500	-	-	-	-	-	-	-	-	-	-	-	500
Net New Equity Investment	71,250	-	-	-	-	-	-	-	-	-	-	-	71,250
Less: Purchase Property	33,250	-	-	-	-	-	-	-	-	-	-	-	33,250
Capital Investment	2,100	67,700	5,500	5,000	5,000	5,000	1,000	1,000	1,450	3,000	3,000	3,000	102,750
Dy Development	-	-	-	-	-	-	20,000	20,000	-	-	-	-	40,000
Changes in Working Capital	-	(75)	47,370	(3,774)	(16,051)	22,798	(7,807)	(17,979)	22,024	(19,278)	(9,436)	(17,792)	-
Stores and Inventory	-	-	5,000	-	-	-	-	-	-	-	-	-	-
Repay Concentrate Facility	-	-	1,733	1,855	1,984	2,123	2,272	2,431	2,601	-	-	(5,000)	-
Repay Line of Credit	-	-	3,276	3,604	3,964	4,360	4,796	-	-	-	-	-	15,000
Lease Payments	-	-	2,840	3,124	3,436	-	-	-	-	-	-	-	20,000
Repay Partner Loan	-	500	-	-	-	-	-	-	-	-	-	-	9,400
Net Cash Flow to Project	36,400	(35,220)	21,642	55,715	17,971	39,951	50,700	30,175	27,753	41,527	17,597	30,822	500
Accum. NCF to Project	36,400	1,180	22,821	78,536	96,507	136,458	187,158	217,333	245,086	286,613	304,210	335,032	335,032
PV of Accum. NCF disc. at 5%	36,400	2,029	22,143	71,460	86,610	118,685	157,453	179,427	198,675	226,105	237,175	255,641	255,641
PV of Accum. NCF disc. at 10%	36,400	2,819	21,577	65,480	78,353	104,370	134,386	150,626	164,205	182,676	189,792	201,122	201,122
PV of Accum. NCF disc. at 15%	36,400	3,557	21,106	60,390	71,409	92,709	116,215	128,380	138,109	150,768	155,433	162,537	162,537
Project IRR (X)	-	-	-	-	6.7	18.6	26.4	29.0	30.6	32.1	32.6	33.1	33.1

US Zinc Price held to \$0.60/lb

Anvil Range Mining Corporation
Smelter Schedules
(Canadian \$000's)

	Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Zinc Concentrate													
Concentrate Shipped (Tonnes)	-	-	333,900	298,596	215,032	332,830	272,604	165,789	306,887	182,941	122,907	122,907	2,354,395
Zinc Grade (%)	-	-	52.0	53.0	52.0	53.0	53.0	53.0	53.0	53.0	53.0	53.0	52.7
Contained Zinc (M lbs)	-	-	382.8	348.9	246.5	388.9	318.5	193.7	358.6	213.8	143.6	143.6	2,737.7
Payable Zinc (US\$/t)	-	-	582.01	595.24	582.01	595.24	595.24	595.24	595.24	595.24	595.24	595.24	592.16
Less: Smelter Charge (US\$/t)	-	-	228.57	228.57	228.57	228.57	228.57	228.57	228.57	228.57	228.57	228.57	228.57
Mercury Penalty (US\$/t)	-	-	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00
Shipping (US\$/t)	-	-	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50
Net per Tonne Zinc Conc. (US\$/t)	-	-	315.94	329.17	315.94	329.17	329.17	329.17	329.17	329.17	329.17	329.17	326.09
Total Zinc Conc. Revenue (\$US 000's)	-	-	105,493	98,289	67,938	109,558	89,733	54,573	101,018	60,219	40,457	40,457	767,734
(\$CND 000's)	-	-	140,657	131,052	90,583	146,077	119,644	72,764	134,691	80,292	53,943	53,943	1,023,645
Lead Concentrate													
Concentrate Shipped (Tonnes)	-	-	176,129	158,581	102,933	172,226	144,585	86,921	172,508	114,860	84,563	84,563	1,297,869
Lead Grade (%)	-	-	62.0	63.5	63.0	64.0	64.0	64.0	64.0	64.0	64.0	64.0	63.6
Silver Grade (g/t)	-	-	631.5	619.7	604.7	682.2	684.3	628.2	625.8	548.3	489.2	489.2	623.0
Gold Grade (g/t)	-	-	6.3	5.9	5.1	7.0	8.5	7.0	6.6	4.9	3.4	3.4	6.3
Contained Lead (M lbs)	-	-	240.7	222.0	143.0	243.0	204.0	122.6	243.4	162.1	119.3	119.3	1,818.5
Contained Silver (Kilos)	-	-	111,231	98,280	62,244	117,499	98,935	54,608	107,951	62,973	41,371	41,371	808,623
Contained Gold (Kilos)	-	-	1,103	941	529	1,205	1,235	609	1,146	567	286	286	8,161
Payable - Lead (US\$/t)	-	-	363.58	372.38	369.45	375.31	375.31	375.31	375.31	375.31	375.31	375.31	372.90
- Silver (US\$/t)	-	-	100.21	98.23	95.70	108.73	109.07	99.66	99.24	86.22	76.31	76.31	97.21
- Gold (US\$/t)	-	-	60.88	57.09	47.93	69.43	87.27	69.45	65.33	45.54	27.52	27.52	58.92
	-	-	524.67	527.70	513.08	553.47	571.65	544.42	539.88	507.07	479.13	479.13	529.03
Less: Smelter Charge (US\$/t)	-	-	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00
Silver Refining (US\$/t)	-	-	5.47	5.36	5.22	5.93	5.95	5.44	5.41	4.70	4.16	4.16	5.30
Gold Refining (US\$/t)	-	-	1.18	1.11	0.93	1.35	1.70	1.35	1.27	0.89	0.53	0.53	1.15
Shipping (US\$/t)	-	-	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50
Net per Tonne Lead Conc. (US\$/t)	-	-	330.52	333.73	319.43	358.69	376.51	350.14	345.70	313.99	286.94	286.94	335.08
Total Lead Conc. Revenue (\$US 000's)	-	-	58,214	52,924	32,880	61,776	54,437	30,434	59,635	36,064	24,264	24,264	434,893
(\$CND 000's)	-	-	77,619	70,565	43,840	82,368	72,583	40,579	79,514	48,086	32,352	32,352	579,858
Smelter Return (\$CND 000's)	-	-	223,801	206,569	137,868	233,916	196,747	116,080	219,398	131,603	88,543	88,543	1,643,069
Less: Marketing Commissions (\$CND 000's)	-	-	7,485	6,947	4,636	7,756	6,431	3,858	7,388	4,604	3,216	3,216	55,537
Net Smelter Return (\$CND 000's)	-	-	216,317	199,623	133,232	226,160	190,315	112,222	212,010	126,999	85,327	85,327	1,587,532

Independent Metal Prices

Anvil Range Mining Corporation
(CND\$ thousands)

		Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Metal Prices														
Zinc	(US\$/lb)	-	-	0.49	0.57	0.73	0.77	0.72	0.57	0.41	0.39	0.49	0.63	0.58
Lead	(US\$/lb)	-	-	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28	0.28
Silver	(US\$/oz)	-	-	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50	5.50
Gold	(US\$/oz)	-	-	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00	400.00
US:Canada Rate		1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33	1.33
Production														
Grum/Vangorda/Stockpiles														
Waste Mined	(kt)	-	22,500	29,989	27,000	27,000	24,000	12,280	6,882	5,779	962	-	-	156,392
Ore Mined	(kt)	-	-	4,200	4,200	4,200	4,200	4,200	3,028	3,221	913	-	-	28,162
Grade - zinc	(%)	-	-	5.30	4.71	3.37	5.25	4.30	3.10	4.30	4.25	-	-	4.38
- lead	(%)	-	-	3.25	2.96	1.93	3.24	2.72	1.83	2.56	2.59	-	-	2.68
- silver	(g/t)	-	-	50.93	45.00	28.50	53.80	45.30	29.40	44.30	45.50	-	-	43.04
- gold	(g/t)	-	-	0.75	0.64	0.36	0.82	0.84	0.52	0.81	0.88	-	-	0.69
Dy														
Ore Mined	(kt)	-	-	-	-	-	-	-	241	979	1,200	1,200	1,200	4,820
Grade - zinc	(%)	-	-	-	-	-	-	-	6.62	6.62	6.62	6.62	6.62	6.62
- lead	(%)	-	-	-	-	-	-	-	5.50	5.50	5.50	5.50	5.50	5.50
- silver	(g/t)	-	-	-	-	-	-	-	66.30	66.30	66.30	66.30	66.30	66.30
- gold	(g/t)	-	-	-	-	-	-	-	0.68	0.68	0.68	0.68	0.68	0.68
Mill Schedule														
Ore Milled	(kt)	-	-	4,200	4,200	4,200	4,200	4,200	3,269	4,200	2,113	1,200	1,200	32,982
Grade - zinc	(%)	-	-	5.30	4.71	3.37	5.25	4.30	3.36	4.84	5.60	6.62	6.62	4.71
- lead	(%)	-	-	3.25	2.96	1.93	3.24	2.72	2.10	3.25	4.24	5.50	5.50	3.09
- silver	(g/t)	-	-	50.93	45.00	28.50	53.80	45.30	32.12	49.43	57.31	66.30	66.30	46.44
- gold	(g/t)	-	-	0.75	0.64	0.36	0.82	0.84	0.53	0.78	0.77	0.68	0.68	0.68
Recovery - Zinc														
- Lead	(%)	-	-	78.0	80.0	79.0	80.0	80.0	80.0	80.0	82.0	82.0	82.0	79.9
- Silver	(%)	-	-	80.0	81.0	80.0	81.0	81.0	81.0	81.0	82.0	82.0	82.0	80.9
- Gold	(%)	-	-	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0	52.0
		-	-	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0	35.0
Zinc Concentrate														
Production	(t)	-	-	333,900	298,596	215,032	332,830	272,604	165,789	306,887	182,941	122,907	122,907	2,354,395
Zinc Grade	(%)	-	-	52.0	53.0	52.0	53.0	53.0	53.0	53.0	53.0	53.0	53.0	52.7
Net Value		-	-	128,802	146,702	133,067	230,271	170,210	73,274	89,508	52,421	49,182	67,026	1,140,463
Lead Concentrate														
Production	(t)	-	-	176,129	158,581	102,933	172,226	144,585	86,921	172,508	114,860	84,563	84,563	1,297,869
Grade - Lead	(%)	-	-	62.0	63.5	63.0	64.0	64.0	64.0	64.0	64.0	64.0	64.0	63.6
Grade - Silver	(g/t)	-	-	631.5	619.7	604.7	682.2	684.3	628.2	625.8	548.3	489.2	489.2	623.0
Grade - Gold	(g/t)	-	-	6.3	5.9	5.1	7.0	8.5	7.0	6.6	4.9	3.4	3.4	6.3
Net Value		-	-	85,251	77,437	48,300	89,831	78,849	44,345	86,989	53,063	36,017	36,017	636,099
Total Smelter Return														
Less: Ocean Freight		-	-	214,053	224,139	181,367	320,103	249,059	117,620	176,497	105,484	85,198	103,043	1,776,562
Marketing Commissions		-	-	16,576	14,858	10,334	16,414	13,559	8,213	15,580	9,679	6,743	6,743	118,699
Net Smelter Return		-	-	<u>6,827</u>	<u>7,014</u>	<u>5,465</u>	<u>9,500</u>	<u>7,400</u>	<u>3,691</u>	<u>5,926</u>	<u>3,709</u>	<u>2,964</u>	<u>3,410</u>	<u>55,907</u>
		-	-	190,650	202,266	165,568	294,188	228,100	105,715	154,992	92,096	75,491	92,890	1,601,957

Independent Metal Prices

Anvil Range Mining Corporation
(CND\$ thousands)

	Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Operating Costs													
Grua/Vangorda/Stockpile	-	-	-	-	-	-	-	-	-	-	-	-	-
Mining - Waste	-	-	41,685	37,530	37,530	33,360	17,069	9,566	8,033	1,337	-	-	186,110
- Ore	-	-	11,550	11,550	11,550	11,550	11,550	8,327	8,858	2,511	-	-	77,446
Milling	-	-	31,416	31,416	31,416	31,416	31,416	22,649	24,093	6,829	-	-	210,652
G&A	-	-	10,164	10,164	10,164	10,164	10,164	7,328	7,795	2,209	-	-	68,152
Environmental	-	-	1,050	1,050	1,050	1,050	1,050	757	805	228	-	-	7,041
Subtotal	-	-	95,865	91,710	91,710	87,540	71,249	48,627	49,584	13,115	-	-	549,400
DY													
Ore Mining	-	-	-	-	-	-	-	-	-	-	-	-	-
Milling	-	-	-	-	-	-	-	603	30,593	37,500	37,500	37,500	143,696
G&A	-	-	-	-	-	-	-	1,959	7,949	9,744	9,744	9,744	39,140
Environmental	-	-	-	-	-	-	-	1,688	6,853	8,400	8,400	8,400	33,741
Subtotal	-	-	-	-	-	-	-	92	372	456	456	456	1,832
Reclamation Security Trust	-	-	-	-	-	-	-	4,342	45,767	56,100	56,100	56,100	218,409
Concentrate Haulage & Handling	-	-	-	6,068	4,967	11,768	6,843	3,171	-	-	-	2,787	35,604
Interest Expense	-	1,495	29,837	26,745	18,601	29,546	24,406	14,784	28,045	17,421	12,137	12,137	213,657
Total Operating Cost	-	1,495	129,191	127,780	117,733	130,429	103,489	71,276	123,577	86,636	68,237	71,024	1,030,867
Cash Operating Profit	-	(1,495)	61,459	74,486	47,836	163,759	124,612	34,439	31,414	5,459	7,254	21,866	571,090
Less: Federal Corp. Taxes													
Yukon Corp. Taxes	-	-	-	-	-	26,083	18,281	1,448	5,511	130	635	3,878	55,967
Yukon Mining Duties	-	-	-	-	-	13,566	9,508	753	2,866	68	330	2,017	29,109
Cash Profit after Taxes	-	(1,495)	60,183	67,651	45,048	107,154	87,104	31,687	22,828	5,261	6,289	15,713	447,422
Cash Flow Calculation													
Cash Profit after Taxes	-	(1,495)	60,183	67,651	45,048	107,154	87,104	31,687	22,828	5,261	6,289	15,713	447,422
Plus:													
Concentrate Facility	-	15,000	-	-	-	-	-	-	-	-	-	-	15,000
Line of Credit	-	10,000	10,000	-	-	-	-	-	-	-	-	-	20,000
Equipment Leases	-	9,400	-	-	-	-	-	-	-	-	-	-	9,400
Partner Loan	500	-	-	-	-	-	-	-	-	-	-	-	500
Net New Equity Investment	71,250	-	-	-	-	-	-	-	-	-	-	-	71,250
Less:													
Purchase Property	33,250	-	-	-	-	-	-	-	-	-	-	-	33,250
Capital Investment	2,100	67,700	5,500	5,000	5,000	5,000	1,000	1,000	1,450	3,000	3,000	3,000	102,750
Dy Development	-	-	-	-	-	-	20,000	20,000	-	-	-	-	40,000
Changes in Working Capital	-	(75)	41,278	2,975	(8,672)	31,520	(15,175)	(28,986)	9,704	(13,877)	(3,231)	(15,461)	-
Stores and Inventory	-	-	5,000	-	-	-	-	-	-	-	-	-	-
Repay Concentrate Facility	-	-	1,733	1,855	1,984	2,123	2,272	2,431	2,601	-	-	-	15,000
Repay Line of Credit	-	-	3,276	3,604	3,964	4,360	4,796	-	-	-	-	-	20,000
Lease Payments	-	-	2,840	3,124	3,436	-	-	-	-	-	-	-	9,400
Repay Partner Loan	-	500	-	-	-	-	-	-	-	-	-	-	500
Net Cash Flow to Project	36,400	(35,220)	10,556	51,094	39,335	64,151	74,211	37,241	9,073	16,138	6,520	33,174	342,672
Accum. NCF to Project	36,400	1,180	11,736	62,830	102,165	166,316	240,526	277,768	286,840	302,978	309,498	342,672	342,672
PV of Accum. NCF disc. at 5X	36,400	2,029	11,840	57,067	90,227	141,732	198,477	225,597	231,889	242,549	246,650	266,525	266,525
PV of Accum. NCF disc. at 10X	36,400	2,819	11,969	52,230	80,408	122,185	166,119	186,163	190,602	197,780	200,416	212,611	212,611
PV of Accum. NCF disc. at 15X	36,400	3,557	12,117	48,143	72,261	106,464	140,870	155,883	159,064	163,983	165,711	173,358	173,358
Project IRR (%)	-	-	-	-	7.9	22.7	31.1	33.5	34.0	34.5	34.6	35.1	35.1

Independent Metal Prices

Anvil Range Mining Corporation
Smelter Schedules
(Canadian \$000's)

		Sep 30 1994	Sep 30 1995	Sep 30 1996	Sep 30 1997	Sep 30 1998	Sep 30 1999	Sep 30 2000	Sep 30 2001	Sep 30 2002	Sep 30 2003	Sep 30 2004	Sep 30 2005	Total
Zinc Concentrate														
Concentrate Shipped	(Tonnes)	-	-	333,900	298,596	215,032	332,830	272,604	165,789	306,887	182,941	122,907	122,907	2,354,395
Zinc Grade	(%)	-	-	52.0	53.0	52.0	53.0	53.0	53.0	53.0	53.0	53.0	53.0	52.7
Contained Zinc	(M lbs)	-	-	382.8	348.9	246.5	388.9	318.5	193.7	358.6	213.8	143.6	143.6	2,737.7
Payable Zinc	(US\$/t)	-	-	475.31	565.48	708.12	763.89	714.29	565.48	406.75	386.91	486.11	625.00	575.40
Less: Smelter Charge	(US\$/t)	-	-	181.00	192.00	239.00	240.00	241.00	229.00	183.00	167.00	181.00	211.00	210.15
Mercury Penalty	(US\$/t)	-	-	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00	5.00
Shipping	(US\$/t)	-	-	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50
Net per Tonne Zinc Conc.	(US\$/t)	-	-	256.81	335.98	431.62	486.39	435.79	298.98	186.25	182.41	267.61	376.50	327.75
Total Zinc Conc. Revenue	(\$US 000's)	-	-	85,749	100,322	92,812	161,887	118,798	49,568	57,157	33,370	32,892	46,275	771,653
	(\$CND 000's)	-	-	114,333	133,763	123,749	215,849	158,398	66,090	76,210	44,493	43,856	61,700	1,028,871
Lead Concentrate														
Concentrate Shipped	(Tonnes)	-	-	176,129	158,581	102,933	172,226	144,585	86,921	172,508	114,860	84,563	84,563	1,297,869
Lead Grade	(%)	-	-	62.0	63.5	63.0	64.0	64.0	64.0	64.0	64.0	64.0	64.0	63.6
Silver Grade	(g/t)	-	-	631.5	619.7	604.7	682.2	684.3	628.2	625.8	548.3	489.2	489.2	623.0
Gold Grade	(g/t)	-	-	6.3	5.9	5.1	7.0	8.5	7.0	6.6	4.9	3.4	3.4	6.3
Contained Lead	(M lbs)	-	-	240.7	222.0	143.0	243.0	204.0	122.6	243.4	162.1	119.3	119.3	1,818.5
Contained Silver	(Kilos)	-	-	111,231	98,280	62,244	117,499	98,935	54,608	107,951	62,973	41,371	41,371	808,623
Contained Gold	(Kilos)	-	-	1,103	941	529	1,205	1,235	609	1,146	567	286	286	8,161
Payable - Lead	(US\$/t)	-	-	363.58	372.38	369.45	375.31	375.31	375.31	375.31	375.31	375.31	375.31	372.90
- Silver	(US\$/t)	-	-	100.21	98.23	95.70	108.73	109.07	99.66	99.24	86.22	76.31	76.31	97.21
- Gold	(US\$/t)	-	-	60.88	57.09	47.93	69.43	87.27	69.45	65.33	45.54	27.52	27.52	58.92
		-	-	524.67	527.70	513.08	553.47	571.65	544.42	539.88	507.07	479.13	479.13	529.03
Less: Smelter Charge	(US\$/t)	-	-	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00	155.00
Silver Refining	(US\$/t)	-	-	5.47	5.36	5.22	5.93	5.95	5.44	5.41	4.70	4.16	4.16	5.30
Gold Refining	(US\$/t)	-	-	1.18	1.11	0.93	1.35	1.70	1.35	1.27	0.89	0.53	0.53	1.15
Shipping	(US\$/t)	-	-	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50	32.50
Net per Tonne Lead Conc.	(US\$/t)	-	-	330.52	333.73	319.43	358.69	376.51	350.14	345.70	313.99	286.94	286.94	335.08
Total Lead Conc. Revenue	(\$US 000's)	-	-	58,214	52,924	32,880	61,776	54,437	30,434	59,635	36,064	24,264	24,264	434,893
	(\$CND 000's)	-	-	77,619	70,565	43,840	82,368	72,583	40,579	79,514	48,086	32,352	32,352	579,858
Smelter Return	(\$CND 000's)	-	-	197,477	209,281	171,033	303,688	235,500	109,407	160,917	95,805	78,455	96,300	1,657,864
Less: Marketing Commissions	(\$CND 000's)	-	-	6,827	7,014	5,465	9,500	7,400	3,691	5,926	3,709	2,964	3,410	55,907
Net Smelter Return	(\$CND 000's)	-	-	190,650	202,266	165,568	294,188	228,100	105,715	154,992	92,096	75,491	92,890	1,601,957