

002656

To

D. Marr

Date

September 8, 1977

From

J. C. Devitt

Subject

ENGINEERING DEPARTMENT 1977 THIRD QUARTER REVIEW AND 1978 PLAN

Attached are summaries and backup for the third quarter review and 1978 plan.

PRODUCTION STATISTICS:

See attached memo from J. Mustard dated August 29, 1977.

Ore will be mined from the following sources:

Third Quarter 1977:

<u>Month</u>	<u>Phase</u>	<u>Bench</u>	<u>Tons</u>	<u>% Pb</u>	<u>% Zn</u>
October	4	3810	150,000	2.2	4.1
	4	3790	<u>160,000</u>	<u>2.4</u>	<u>5.5</u>
Total			310,000	2.3	4.8
November	4	3790	260,000	2.5	4.1
	5	3930	11,000	6.4	9.6
	5	3910	<u>29,000</u>	<u>5.4</u>	<u>7.3</u>
Total			300,000	2.9	4.6
December	5	3910	10,000	5.9	8.2
	4	3790	141,000	2.1	5.4
	4	3770	90,000	3.5	8.4
	5	3890	<u>69,000</u>	<u>2.9</u>	<u>5.1</u>
Total			310,000	2.8	6.3
TOTAL THIRD QUARTER			920,000	2.7	5.2

Year 1978:

<u>Phase</u>	<u>Bench</u>	<u>Tons</u>	<u>% Pb</u>	<u>% Zn</u>
4	3750	527,000	2.8	5.7
4	3710	987,000	2.9	5.2
5	3870	94,000	3.2	5.4
5	3830	129,000	4.2	6.0
5	3790	296,000	2.3	4.4
5	3750	537,000	3.4	6.0
5	3710	<u>1,060,000</u>	<u>3.4</u>	<u>5.9</u>
Total		3,630,000	3.1	5.6

Total yearly production in 1978 is reduced by 20,000 tons due to a reduction in mill throughput for a seven day period in February.

Waste production is scheduled at 31,910 BCY/day for 355 days.

COSTS:

See attached sheets for cost summary.

MANPOWER:

Third Quarter:

Based on a projection of present supervisory and non-supervisory personnel at existing rates with 8% added to non-supervisory manpower on October 1. Core-splitter is dropped in November, and two vacation replacements are required in December.

1978:

Supervisory

Total authorized at \$9389 + 10% + 17% per month for a total of \$12,084 per month. Temporary Authorized one Geologist for first six months in addition to the above.

Non-Supervisory

Total Authorized - 7. Overtime budgeted at 69 hours/month based on average of first seven months of 1977. Temporary authorized are summer student in June-August time period. Vacation and Leave of Absence replacement budgeted for total of three man-months spread throughout the year. Total man hours required per job is:

$$365 \div 7 \times 40 = 2086 - 80 = \underline{2006 \text{ hours}}$$

Rates per job are:

1500 hours @ \$10.35/hour (first 9 months)

506 hours @ \$11.39/hour (last 3 months)

2006 hours @ \$10.61/hour (weighted yearly rate)

Costs for seven basic authorized are:

S.T. 7 x 2006 x \$10.61 = \$ 148,986

O.T. 69 x 12 x \$10.61 = 8,785

Replacement 2006 ÷ 4 x \$10.61 = 5,321

Total \$ 163,092

Costs for summer student:

2006 ÷ 4 x \$10.61 = \$ 5,321

SUPPLIES:

Third Quarter:

Reduced 1/3 from plan to match YTD costs. This item covers stakes, sample bags, printing paper, drafting supplies, etc.

1978:

Increased \$1000/month above 1977 actual to cover anticipated heavy usage of computer supplies in 1978.

OUTSIDE SERVICES:

Third Quarter:

Reduced 1/2 from plan. We still need some consulting analysis on slope stability this year and some repairs to surveying and printing equipment which will use up the \$1000/month now projected.

1978:

Projected to accommodate the estimated 20,000 - 25,000 to set up our ore reserve model on computer early in the year. Money later in the year is for repairs to survey equipment and computer time.

OTHER:

Third Quarter:

This account covers vehicle gasoline, taxis, and other expense accounts from seminars, etc. Projected at plan for third quarter.

1978:

Projected somewhat less than 1977 plan to be in line with historical usage.

DIAMOND DRILLING:

Third Quarter:

Covers \$5000 for assaying, \$3000 yet to be invoiced from Caron, and \$1000 for core splitting room repairs.

1978:


No diamond drilling in 1978.

CAPITAL COST:

See attached list for cash flow.

Deferred cost of \$15,000 in A.F.E. 76018 is for sump waterproofing. It is judged too high a risk to shotcrete this late in the year due to cold.

The final stage of coping with the Faro Valley water must be done next year. The existing flume must be abandoned and water redirected away from the unstable east wall. This will be done by construction of an impervious sump under the valley on the 4030 bench and construction of a pipe or flume around the north end of the pit on the 4030 bench. The money included is an order of magnitude estimate only.



J. C. Devitt  
Chief Mining Engineer

JCD/mm

cc. G. Wight  
P. Taggart  
A. von Kursell

Attach.

To

J. C. Devitt

Date

August 29, 1977


From

J. W. Mustard

Subject 3rd. QUARTER REVIEW

Attached is a copy of the 3rd. Quarter Review for 1977 and the 1978 Schedule. Grades are given by month for the 3rd. Quarter, 1977 and by quarter for 1978. Grades were calculated using the following parameters:

- (1) Milling rate of 10,000 SDT/Day
- (2) 1977 Tonnage and Grade Model
- (3) September 1, 1977 Mining Schedule
- (4) August 1, 1977 Pit Status
- (5) 3.50 SDT/BCY



J. W. Mustard  
Mine Geologist

JWM/mm





CYPRUS ANVIL MINING CORPORATION

ENGINEERING DEPARTMENT

3rd. QUARTER FORECAST

	Jan.	Feb.	Mar.	1st. Qtr.	Apr.	May	June	2nd. Qtr.	1st. Half	July	Aug.	Sept.	3rd. Qtr.	3rd. Qtr. YTD	Oct.	Nov.	Dec.	4th. Qtr.	Full Year Fcst.	Year Plan	
<u>Controllable Costs:</u>																					
Salaries	17	22	22	61	23	22	24	69	130	28		28			29	28	30	87		352	
Supplies	1	1	3	5	-	2	3	5	10	1		2			2	2	2	6		36	
Outside Services	-	-	2	2	(1)	1	-	-	2	-		1			1	1	1	3		32	
Other	-	1	1	2	1	-	-	1	3	1		2			2	2	2	6		24	
Diamond Drilling	-	2	(6)	(4)	7	10	41	58	54	122		5			4	-	-	4		245	
<b>TOTAL ENGINEERING DEPARTMENT COSTS</b>	<b>18</b>	<b>26</b>	<b>22</b>	<b>66</b>	<b>30</b>	<b>35</b>	<b>68</b>	<b>133</b>	<b>199</b>	<b>152</b>		<b>38</b>			<b>38</b>	<b>33</b>	<b>35</b>	<b>106</b>		<b>689</b>	

CYPRUS ANVIL MINING CORPORATION

ENGINEERING DEPARTMENT

1973 PLAN

	Jan.	Feb.	Mar.	1st. Qtr.	Apr.	May	June	2nd. Qtr.	1st. Half	July	Aug.	Sept.	3rd. Qtr.	3rd. Qtr. YTD	Oct.	Nov.	Dec.	4th. Qtr.	Full Fcst.	Year Plan	
<b><u>Controllable Costs:</u></b>																					
Salaries	27	27	27	81	27	27	29	83	164	27	27	26	80	244	27	27	27	81		325	
Supplies	3	3	3	9	3	3	3	9	18	3	3	3	9	27	3	3	3	9		36	
Outside Services	-	5	5	10	5	5	3	13	23	3	3	2	8	31	2	2	2	6		37	
Other	1	1	2	4	1	1	2	4	8	1	1	2	4	12	1	1	2	4		16	
Diamond Drilling	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	
<b>TOTAL ENGINEERING DEPARTMENT COSTS</b>	<b>31</b>	<b>36</b>	<b>37</b>	<b>104</b>	<b>36</b>	<b>36</b>	<b>37</b>	<b>109</b>	<b>213</b>	<b>34</b>	<b>34</b>	<b>33</b>	<b>101</b>	<b>314</b>	<b>33</b>	<b>33</b>	<b>34</b>	<b>100</b>		<b>414</b>	

ENGINEERING DEPARTMENT

CAPITAL EXPENDITURE CASH FLOW FORECAST

	1977				1978												
	S	O	N	D	J	F	M	A	M	J	J	A	S	O	N	D	
A.F.E. 75001 Maintenance Complex Expansion	547	358	207	196	93												
A.F.E. 76008 Engineering Pickup	5																
A.F.E. 76015 Faro Valley Drainage	98																
A.F.E. 76018 Pit Pumping	7	8									15						
Faro Valley Sump and North Wall Flume										40	40	40					