

746001

2 AUG 1982

MICROFILMED



OPEN FILE

82-1794

746001

McINTYRE MINES (AUSTRALIA) PTY. LTD.

QUARTERLY REPORT

E.L. 17/68 & C.L. 105M/77

Period MAY 4th 1982 - AUGUST 3rd 1982.

**OPEN FILE**

McINTYRE MINES (AUSTRALIA) PTY. LTD.

EXPLORATION LICENCE 17/68 & CONSOLIDATED LEASE 105M/77.

QUARTERLY REPORT FOR THE PERIOD

MAY 4th 1982 TO AUGUST 3rd 1982

Cliff H. Whitehead,

McIntyre Mines (Australia) Pty. Ltd.

3rd August, 1982.

TABLE OF CONTENTS

	<u>PAGE</u>
Introduction and Summary	1
1. Diamond Drilling Programmes	
A - Exploratory Drilling	2
B - Extension - Infill Drilling	3
2. Engineering - Production - Economic Studies	4
3. Metallurgical Work	4
4. Geological/Exploration Work	4
5. General	
A - Personnel	5
B - Expenditures	5
Attachment "A" - Statement Of Expenditure Three months to August 3rd 1982.	
Appendix "A" - Drill Assay Logs DDH320, 321 and 323.	
Plan "A" - E.L. 17/68. Scale 1: 10,000.	

QUARTERLY REPORT - PERIOD, MAY 4th 1982 TO AUGUST 3rd 1982E. L. 17/68 and C. L. 105M/77Introduction and Summary

During the three month period to August 3rd 1982, McIntyre Mines (Australia) Pty. Ltd., as manager of a joint venture with Tasminex N.L., has continued with ongoing exploration work and economic appraisals within E. L. 17/68 and its associated mining tenement C. L. 105M/77.

Exploration undertaken during the present quarter forms part of the work programme proposed for the present 12 month term of E.L. 17/68 (originally outlined to the Mines Department on November 3rd 1981). The programme is considered to be on schedule, and to date, costs will be within estimated budget.

A large proportion of work carried out by McIntyre Mines during the quarter has involved the continuation of Phase 2 investigations of a Pre - Development Programme. This six month programme of investigations is planned for completion at the end of August, and to date is again considered to be on schedule.

The nature of work forming the basis of the two above programmes has consisted of surface geologic - exploration activities, diamond drilling (both extension and exploratory), metallurgical research, and engineering - production - feasibility studies.

During the quarter ending August 3rd 1982, McIntyre Mines (Australia) Pty. Ltd., have incurred expenditures totalling \$112,543. 00. Of this total, \$23,799 are accountable to work in E.L. 17/68 and \$88,744 to investigations in C.L. 105M/77.

For the initial nine month period of the present E.L. 17/68 tenancy, a total of \$273,346. 00 has been incurred by McIntyre Mines.

The following comments briefly review the activities completed during the quarter in question. More detailed results and final reports will be submitted, accompanying the final report for the present 12 month term of E.L. 17/68, (expiry November 3rd 1982).

## 1. DIAMOND DRILLING PROGRAMMES

Both infill-extension drilling programmes (in areas of known tungsten mineralisation) and exploratory drilling programmes (in areas of suspected subsurface skarns), have been continued. Due to drill crew annual holidays, the total drilled metreage figures are lower than average for the present quarter, and overall, the results of drilling have been generally negative and disappointing.

### A - EXPLORATORY DRILLING

Primarily, this drilling has been initiated to investigate possible mineralisation associated with suspected buried subsurface skarns.

Two areas - the Kara North Magnetite Anomaly location, and the area between Bobs Bonanza and the Eastern Ridge - have been investigated. Details of holes completed during the quarter are as follows.

<u>Hole No.</u>	<u>Location</u>	<u>Drill Section</u>	<u>Inclination</u>	<u>Depth Drilled</u> (metres)
DDH 320	Kara N. Mag Anomaly	7160N	60°W	88.07
DDH 321	Kara N. Mag Anomaly	7160N	87°E	45.72
DDH 324	South of Eastern Ridge	6185N	50°E	63.80

DDH 320 was drilled along the western flank of the Kara North Magnetite Anomaly. The hole provided a more accurate determination of the contact between skarn and granite, and previously unsuspected fracture systems were delineated. Intersected skarn was found to be both extremely weathered and lacking tungsten anomalism.

DDH 321 was collared along section line 7160N to intersect skarn at depth immediately beneath overlying metamorphosed Gordon Limestone. Only low grade, widely dispersed  $WO_3$  mineralisation was intersected.

Additional drilling plans at the Kara North Magnetite Anomaly had to be terminated due to impossible manoeuvrability in the winter months.

DDH 324 was drilled to investigate the possible southern strike extensions of the Eastern Ridge skarns beneath Tertiary basalt cover. Drilling outlined a deep transgressive Tertiary valley (with basalt and sediment infill) which had eroded the higher levels of the skarn zones and consequently, the target locations of possible mineralisation.

#### B - Extension - Infill Drilling

Two locations have been investigated during the quarter. Details of holes completed and progress are as follows:-

<u>Hole No.</u>	<u>Location</u>	<u>Drill Section</u>	<u>Inclination</u>	<u>Depth Drilled</u> (metres)
DDH 322	Bobs Bonanza	5820N	65°E	36.22
DDH 323	Eastern Ridge	6270N	54°E	81.38
DDH 325	Eastern Ridge	6242N	55°E	41.76

(above in progress)

DDH 322 was collared to study possible up dip extension of low grade mineralisation recently intersected by DDH 309. Although the lower skarn unit was intersected, little or no mineralisation was associated with the skarn.

It was decided additional drilling was justified at the Eastern Ridge deposit, south of the East Kara Creek. Surface trenching at this location had previously recorded fresh to partially weathered scheelite mineralisation in both the Upper and Lower Skarn Zones. A series of shallow holes are planned to investigate possible down dip extensions of this surface mineralisation. Drilling is at present in progress

Both drill - assay logs and drill section plans showing details of the above holes are as yet incomplete, but will be included with final 12 monthly E.L. report. Appendix A however includes assay logs for DDH 320, 321 and 323.

## 2. ENGINEERING - PRODUCTION - ECONOMIC STUDIES

The above detailed studies are being completed by outside consultants - Golder Associates of Sydney.

The studies are being carried out to evaluate the economics of open pit mining at the Kara No. 1 and Kara North deposits - two zones where geologic reserves of fresh and partially weathered ore have been significantly increased by recent drill programmes.

The investigations, initiated in early April, have been underway throughout the present quarter. A final report is expected during the month of August 1982.

## 3. METALLURGICAL STUDIES

A - FLOTATION RESEARCH TESTS. Are being completed by Warman International Laboratories Ltd., Sydney, on a bulk sample of fresh to partially weathered ore from the Main Ore Zone at Kara No. 1 (Sample No. - Kara 21). The results of this research will be completed in time for inclusion in Phase 2 work of the Pre - Development Work.

B - In July test work was initiated to estimate fine scheelite gravity recoveries on a bulk sample of concentrator table tailings (Sample No. Kara 22).

## 4. GEOLOGICAL - EXPLORATION WORK

A - REGIONAL MAPPING Mapping in the western section of the E.L. area has been continued, special emphasis being placed on the area north of Location L. 13, the Loudwater Creek drainage and south of Hampshire.

B - GROUND MAGNETIC SURVEYS A grid survey has been initiated over the Hampshire magnetite skarn. Preliminary results indicate extensions of skarn in a northerly direction beneath shallow basalt cover.

C - GEOCHEMISTRY Detailed pan concentrate sampling was completed in Horizontal Creek and its tributaries, east of the Eastern Ridge area. Anomalous scheelite values in samples were confirmed, but to date no surface

..5

skarns can be identified. The source of scheelite is at present assumed to be associated with quartz stringers and veins along the margin of the Eastern Ridge granite.

5. GENERAL

A - PERSONNEL The following McIntyre Mines (Australia) Pty. Ltd., personnel have been employed during the quarter up to August 3rd 1982.

Full time - One geologist, one diamond drill operator and one prospector.

Casual - One field assistant.

Part time - One draftsman, one typist.

B - EXPENDITURES Attachment "A" shows an itemised statement of expenditures incurred by McIntyre Mines for the three month period to August 3rd 1982.



Cliff H. Whitehead,  
McIntyre Mines (Australia) Pty. Ltd.,  
Burnie.

3rd August, 1982.

ATTACHMENT "A"STATEMENT OF EXPENDITURE - E.L. 17/68 AND C.L. 105M/77

McIntyre Mines (Australia) Pty. Ltd., as manager of a joint venture with Tasminex N.L., incurred the following expenditures within E.L. 17/68 and C.L. 105M/77, during the three month period to August 3rd, 1982.

	<u>E.L. 17/68</u>	<u>C.L. 105M/77</u>	<u>TOTAL</u>
Office, Rent, Services	3,611	8,526	12,137
Supplies, food, hotel	-	482	482
Geology	3,207	5,147	8,354
Ground Magnetometry	453	156	609
Metallurgy	-	3,314	3,314
Assays	1,296	548	1,844
Transportation	2,345	4,010	6,355
Engineering - Consultants	-	48,750	48,750
Environmental	-	94	94
Engineering - McIntyre	-	2,912	2,912
Diamond Drilling	12,349	12,513	24,862
Legal Fees	451	1,737	2,188
Insurance	87	555	642
	<u>23,799</u>	<u>88,744</u>	<u>112,543</u>
Totals	A\$		

Total Expenditures previously reported = \$2,078,123.

Total to date = \$2,190,666.



Cliff H. Whitehead,  
McIntyre Mines (Australia) Pty. Ltd.

3rd August, 1982.

APPENDIX "A"

Assay Drill Logs - DDH 320 (Four sheets)  
DDH 321 (Two sheets)  
DDH 323 (Three sheets).

526512.  
591E1E2.

746012

LIBRARY

011

320

(REC) NECESSARY, CONSIDER 30% EXCEPT AS NOTED AREA NORTH  
 (WX) NECESSARY, CONSIDER 30% EXCEPT AS NOTED. WX INDICATES CLAYEY, LIMONITE MATERIAL 1/5  
 MICRORETITE APPROX.

SECTION:				ASSAY						AVE:			AVE:			
SAMP NO.	REC WX	INTERVAL	LGTH		PPM H <sub>2</sub> O				INVL	LGTH SM-%	WT AR	AV.	INVL	LGTH SM-%	WT AR	AV.
D02-1	CORE	7-00-9-14	2-14		50											
" 2	"	9-14-10-36	1-22		45											
" 3	"	10-36-11-89	1-53		30											
" 4	"	11-89-13-0	1-11		100											
" 5	"	13-0-14-0	1-0		100											
" 6	"	14-0-15-0	1-0		45											
" 7	"	15-0-16-0	1-0		20											
" 8	"	16-0-17-0	1-0		20											
" 9	"	17-0-18-0	1-0		15											
" 10	"	18-0-19-0	1-0		20											
" 11	"	19-0-20-0	1-0		20											
" 12	"	20-0-21-0	1-0		25											
" 13	"	21-0-22-0	1-0		35											
" 14	"	22-0-23-0	1-0		25											
" 15	"	23-0-24-0	1-0		20											
" 16	"	24-0-25-0	1-0		30											
" 17	"	25-0-26-0	1-0		30											
" 18	"	26-0-27-0	1-0		25											
" 19	"	27-0-28-0	1-0		25											
" 20	"	28-0-29-0	1-0		10											
" 21	"	29-0-30-0	1-0		15											
" 22	"	30-0-31-0	1-0		35											
" 23	"	31-0-32-0	1-0		50											
" 24	"	32-0-33-0	1-0		40											
" 25	"	33-0-34-0	1-0		20											
" 26	"	34-0-35-0	1-0		45											
INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	

COMMENT

DDRICT

1111

590182  
590182.

746013 LIBRARY

D.D.N.

012

(REC)

RECOVERY, CONSIDER 30% EXCEPT AS NOTED

KARA NORTH

320

(WX)

WEATHERED, CONSIDER FRESH ROCK EXCEPT AS NOTED. WX INDICATES CLAYEY, LIMONITIC MATERIAL

MAGNETITE ANOMALY

2/3

SECTION :

ASSAY

AVE:

AVE:

SAMP NO.	REC WX	INTERVAL		LGTH	PPM V% <sub>2</sub>	AVE:				AVE:						
						INVL	LGTH SM-%	WT AR	AV	INVL	LGTH SM-%	WT AR	AV			
D320																
27	CORE	35.0	36.0	1.0	40											
28	"	36.0	37.0	1.0	20											
29	"	37.0	38.0	1.0	25											
30	"	38.0	39.0	1.0	25											
31	"	39.0	40.0	1.0	20											
32	"	40.0	41.0	1.0	20											
33	"	41.0	42.0	1.0	25											
34	"	42.0	43.0	1.0	40											
35	"	43.0	44.0	1.0	45											
36	"	44.0	45.0	1.0	35											
37	"	45.0	46.0	1.0	300											
38	"	46.0	47.0	1.0	320											
39	"	47.0	48.0	1.0	40											
40	"	48.0	49.0	1.0	25											
41	"	49.0	50.0	1.0	45											
42	"	50.0	51.0	1.0	40											
43	"	51.0	52.0	1.0	45											
44	"	52.0	53.0	1.0	15											
45	"	53.0	54.0	1.0	20											
46	"	54.0	55.0	1.0	15											
47	"	55.0	56.0	1.0	130											
48	"	56.0	57.0	1.0	290											
49	"	57.0	58.0	1.0	210											
50	"	58.0	59.0	1.0	120											
51	"	59.0	59.73	0.73	65											
INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	AVE

COMMENT

CRACK



(REC) RECOVERY, CONSIDER 30% EXCEPT AS NOTED

(WX) WEATHERING, CONSIDER FRESH ROCK EXCEPT AS NOTED; WX INDICATES CLAYEY, LIMONITIC MATERIAL

SECTION:

ASSAY

AVE:

AVE:

SAMP NO.	REC WX	INTERVAL	LGTH	ASSAY				AVE:				AVE:				
				ppm H <sub>2</sub> O <sub>2</sub>				INVL	LGTH SM-%	WT AR	AV	INVL	LGTH SM-%	WT AR	AV	
D 320 15	SLUDGE	4.57-7.61	3.04	70												
25	"	7.61-10.67	3.06	90												
35	"	10.67-13.72	3.05	55												
45	"	13.72-16.76	3.04	55												
55	"															
65	"	35.05-38.09	3.04	50												
75	"	38.09-41.15	3.06	45												
85	"	41.15-44.20	3.05	45												
95	"															
105	"	47.20-50.29	3.05	55												
115	"	50.29-53.33	3.04	45												
125	"	59.43-62.48	3.05	60												
135	"	62.48-65.53	3.05	55												
145	"															
155	"	71.62-74.67	3.05	85												
165	"	74.67-77.72	3.05	110												
175	"															
185	"															
195	"															
205	"															
215	"															
225	"															
235	"															
245	"															
255	"															
265	"															
275	"															
285	"															
295	"															
305	"															
315	"															
325	"															
335	"															
345	"															
355	"															
365	"															
375	"															
385	"															
395	"															
405	"															
415	"															
425	"															
435	"															
445	"															
455	"															
465	"															
475	"															
485	"															
495	"															
505	"															
515	"															
525	"															
535	"															
545	"															
555	"															
565	"															
575	"															
585	"															
595	"															
605	"															
615	"															
625	"															
635	"															
645	"															
655	"															
665	"															
675	"															
685	"															
695	"															
705	"															
715	"															
725	"															
735	"															
745	"															
755	"															
765	"															
775	"															
785	"															
795	"															
805	"															
815	"															
825	"															
835	"															
845	"															
855	"															
865	"															
875	"															
885	"															
895	"															
905	"															
915	"															
925	"															
935	"															
945	"															
955	"															
965	"															
975	"															
985	"															
995	"															
1005	"															
1015	"															
1025	"															
1035	"															
1045	"															
1055	"															
1065	"															
1075	"															
1085	"															
1095	"															
1105	"															
1115	"															
1125	"															
1135	"															
1145	"															
1155	"															
1165	"															
1175	"															
1185	"															

6145122  
2289182

746016

LIBRARY

010111

321

(REC) RECOVERY, CONSIDER 3% EXCEPT AS NOTED  
 (WX) WEATHERING, CONSIDER 1% EXCEPT AS NOTED. WX INDICATES CLAYEY, SILICATE MATERIAL 1/2

KAPPA NORTH  
MAGNETITE PRINCIPAL

SECTION :				ASSAY				AVE:				AVE:			
SAMP NO.	REC WX	INTERVAL	LGTH	PPM				INVL	LGTH	WT	AV	INVL	LGTH	WT	AV
				WT%					SM-%	AR			SM-%	AR	
7321	CORE	1524-170	176	140											
1	"	170-180	10	240											
2	"	180-190	10	70											
3	"	190-200	10	75											
4	"	200-225	25	280											
5	"	225-230	5	160											
6	"	230-240	10	260											
7	"	240-250	10	130											
8	"	250-260	10	230											
9	"	260-270	10	120											
10	"	270-280	10	450											
11	"	280-290	10	130											
12	"	290-300	10	180											
13	"	300-310	10	760											
14	"	310-320	10	600											
15	"	320-330	10	40											
16	"	330-340	10	210											
17	"	340-350	10	780											
18	"	350-360	10	280											
19	"	360-370	10	50											
20	"	370-380	10	40											
21	"	380-390	10	170											
22	"	390-400	10	250											
23	"	400-410	10	35											
24	"	410-420	10	20											
25	"	420-430	10	25											
26	"	430-440	10												
INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE

COMMENT

PROJECT



746018

323

EASTERN RIDGE 1/3

SECTION :

ASSAY

AVE:

AVE:

Edge Core	Foot	Metres		2 WD <sub>3</sub>	1/100	AVE:			AVE:						
		Interval	Lgth			INVL	LGTH 3M-3	WT AR	AV	INVL	LGTH 3M-3	WT AR	AV		
33331	CORE														
1	"	130-140	10		80										
2	"	140-150	10		30										
3	"	150-160	10		120										
4	"	160-170	10		110										
5	"	170-180	10		85										
6	"	180-190	10		130										
7	"	190-200	10		120										
8	"	200-210	10		200										
9	"	210-220	10		210										
10	"	220-230	10		150										
11	"	230-240	10		100										
12	"	240-250	10		130										
13	"	250-260	10		350										
14	"	260-270	10		200										
15	"	270-280	10		25										
16	"	280-290	10		400										
17	"	290-300	10		3900										
18	"	300-310	10		7500										
19	"	310-320	10		3400										
20	"	320-330	10		2570										
21	"	330-340	10		310										
22	"	340-350	10		290										
23	"	350-360	10		1250										
24	"	360-370	10		140										
25	"	370-380	10		190										
INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE

COMMENT

1001000 1000

BL 17611-  
AC 126193  
AC 127193

EVENT

746019

323

018

LASILAN RIDGE 2/2

SECTION:

ASSAY

AVE:

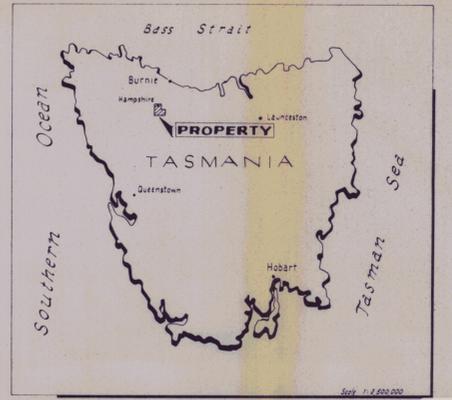
AVE:

Core No.	Foot	Interval		Lgth	2 WD <sub>2</sub>	1100 1000	AVE:			AVE:					
		Interval	Lgth				INVL	LGTH SM-2	WT AR	INVL	LGTH SM-2	WT AR			
3231 26	CORE	38.0	39.0	1.0		260									
27	"	39.0	40.0	1.0		120									
28	"	40.0	41.0	1.0		750									
29	"	41.0	42.0	1.0		220									
30	"	42.0	43.0	1.0		220									
31	"	43.0	44.0	1.0		130									
32	"	44.0	45.0	1.0		10									
33	"	45.0	46.0	1.0		30									
3231 34	CORE	56.0	57.0	1.0		640									
35	"	57.0	58.0	1.0		2950									
36	"	58.0	59.0	1.0		780									
37	"	59.0	60.0	1.0		1650									
38	"	60.0	61.0	1.0		2900									
39	"	61.0	62.0	1.0		3000									
40	"	62.0	63.0	1.0		500									
41	"	63.0	64.0	1.0		1750									
42	"	64.0	65.0	1.0		720									
43	"	65.0	66.0	1.0		1000									
44	"	66.0	67.0	1.0		760									
45	"	67.0	68.0	1.0		1440									
46	"	68.0	69.0	1.0		5500									
47	"	69.0	70.0	1.0		480									
3231 48	CORE	70.6	71.0	1.0		210									
49	"	71.0	72.0	1.0		75									
INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE	INVL	CORE LGTH	WIDTH	AVE

COMMENT

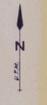
PROJECT 1000



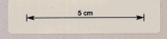


### E.L. 17/68 - KARA PROPERTIES

AREAS WORKED BY MINTYER MINES  
IN QUARTER ENDING AUGUST 2, 1962.



SCALE 1:10000



GEOLOGY		REFERENCE	
RECENT	A Alluvium	—	River
TERTIARY	V Basalt	—	Creek
	D A Conglomerate breccia etc.	—	Road
DEVONIAN	+ Quartz	—	Track
GORDON Limestone	—	—	Railway
	—	—	Trig Station
PROTEROZOIC BEDS	—	—	Geological Boundary
	—	—	Tungsten bearing skarns and ore zones
	—	—	Prospective tungsten skarn zones
	—	—	Tungsten exploration targets

Base Map enlarged from 1:50,000 Major N.T.M. Sheet 818 & Area. Perth, 1960.

