

581.30m--650.00 Bronzitite

Mineral assemblage and rock facies is similar to the upper bronzitite. a comparatively large quantity of clinopyroxene is included. Sulphide dissemination zone is observed between 584.00m and 626.00m.

The results of microscopic observation of thin section of rocks are as follows :

TS-5 (614.50m) : Olivin websterite

Texture : Holocrystalline equigranular orthocumulate to adocumulate.

Cumulus minerals : Mainly large quantities of olivin which grain size generally shows around 5 to 1 mm, and include medium quantities of orthopyroxene and clinopyroxene which grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral plagioclase which grain size shows average 1 to 0.1 mm, and extremely small quantities of anhedral phlogopite and opaque minerals which grain size shows average 0.1 mm.

(4) MJZS-9 (400.00m)

The bed rock appears after the green and pale green soil with gabbro boulder portion of 8.00 meters.

8.00m--190.50m Gabbro

It shows pale green, green to dark green color, and medium to coarse grain, minute, hard. Texture is holocrystalline and equigranular. Mineral assemblage is mainly composed of plenty plagioclase, and orthopyroxene with green to pale green color, clinopyroxene with light purple color. Plagioclase shows a white spot characteristically. Weak and small vein of chlorite is recognized in some parts.

190.50m--328.54m Websterite

It shows dark green color, and medium grain. Texture is holocrystalline and equigranular. Mineral assemblage is mainly composed of about equal quantity of orthopyroxene and clinopyroxene, clinopyroxene shows light purple color and scattered pattern. Weak brecciated zone is observed between 246.00m and 251.00m.

328.54m--400.00m Bronzitite

It shows dark green color. Texture is a coarse grain, holocrystalline and equigranular. Mineral assemblage is almost all composed of orthopyroxene (green to dark green in color) and include a small quantity of clinopyroxene in some parts. Small vein of calcite is observed between 328.54m and 342.90m, sulphide dissemination zone which is mainly composed of pyrite, pyrrhotite and chalcopyrite is recognized along to the vein.

P - Line

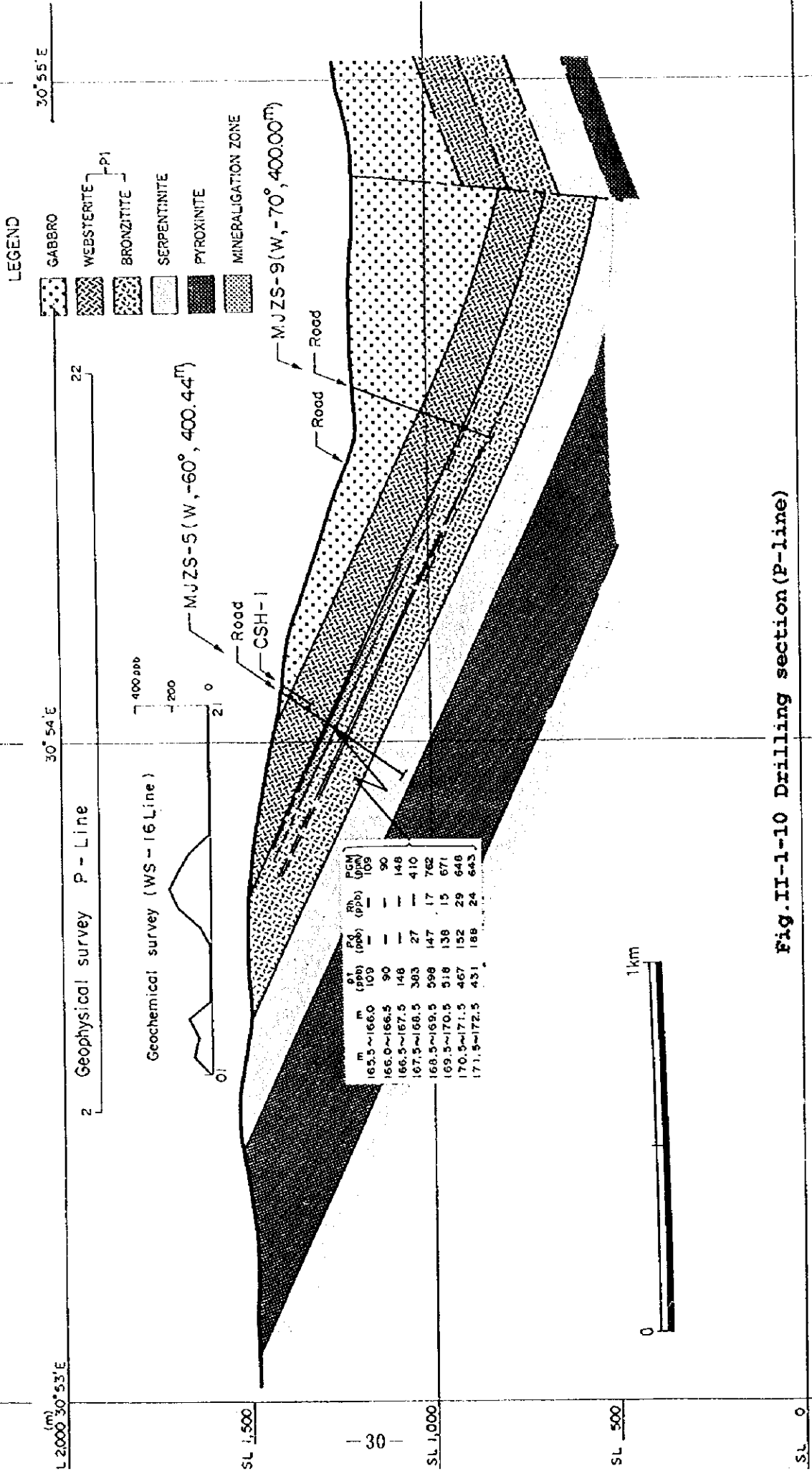


Fig. II-1-10 Drilling section (P-line)

Weak sulphide mineralization is also observed near the bottom of the drill hole.

(5) MJZS-10 (400.00m)

The bed rock appears after the white soil with gabbro boulder portion of 24.89 meters.

24.89m--196.50m Gabbro

It shows green to dark green color, and medium grain, minute, hard. Texture is holocrystalline and equigranular. Mineral assemblage is mainly composed of plenty plagioclase, a small quantity of orthopyroxene and clinopyroxene. Weak and small vein of chlorite is recognized in some parts. Weak brecciated zone (fault?) is observed between 135.00m and 148.00m, 156.50m and 157.00m, 184.00m and 187.00m.

196.50m--301.50m Websterite

It shows green color and light purple scattered pattern, and medium to coarse grain. Texture is holocrystalline and equigranular. Mineral assemblage is mainly composed of orthopyroxene and clinopyroxene, clinopyroxene shows a clear light purple spots. Fault breccia zone is observed between 204.00m and 208.00m, 231.00m and 237.00m.

301.50m--400.00m Bronzite

It shows dark green color. Texture is a coarse grain, holocrystalline and equigranular. Mineral assemblage is almost all composed of orthopyroxene. Brecciated zone is observed between 351.50m and 355.50m, 373.00m and 373.50m, 379.00m and 381.00m, and 386.8m. In the uppermost of this layer an extremely small quantity of olivine is included and becomes extinct gradually from 323m. On the other hand sulphide dissemination which is mainly composed of pyrite, pyrrhotite and chalcopyrite increases. Sulphide dissemination becomes rich around 370m to 379m, and then becomes extinct.

The results of microscopic observation of thin section of rocks are as follows :

TS-6 (371.50m) : Websterite

Texture : Holocrystalline equigranular orthocumulate to adocumulate.

Cumulus minerals : Mainly large to medium quantities of subhedral to anhedral orthopyroxene and clinopyroxene which grain size generally shows around 5 to 1 mm, and many times it shows round form.

Intercumulus minerals : Medium quantities of anhedral orthopyroxene, and small quantities of subhedral to anhedral plagioclase, phlogopite and opaque minerals which grain size shows average 1 to 0.1 mm.

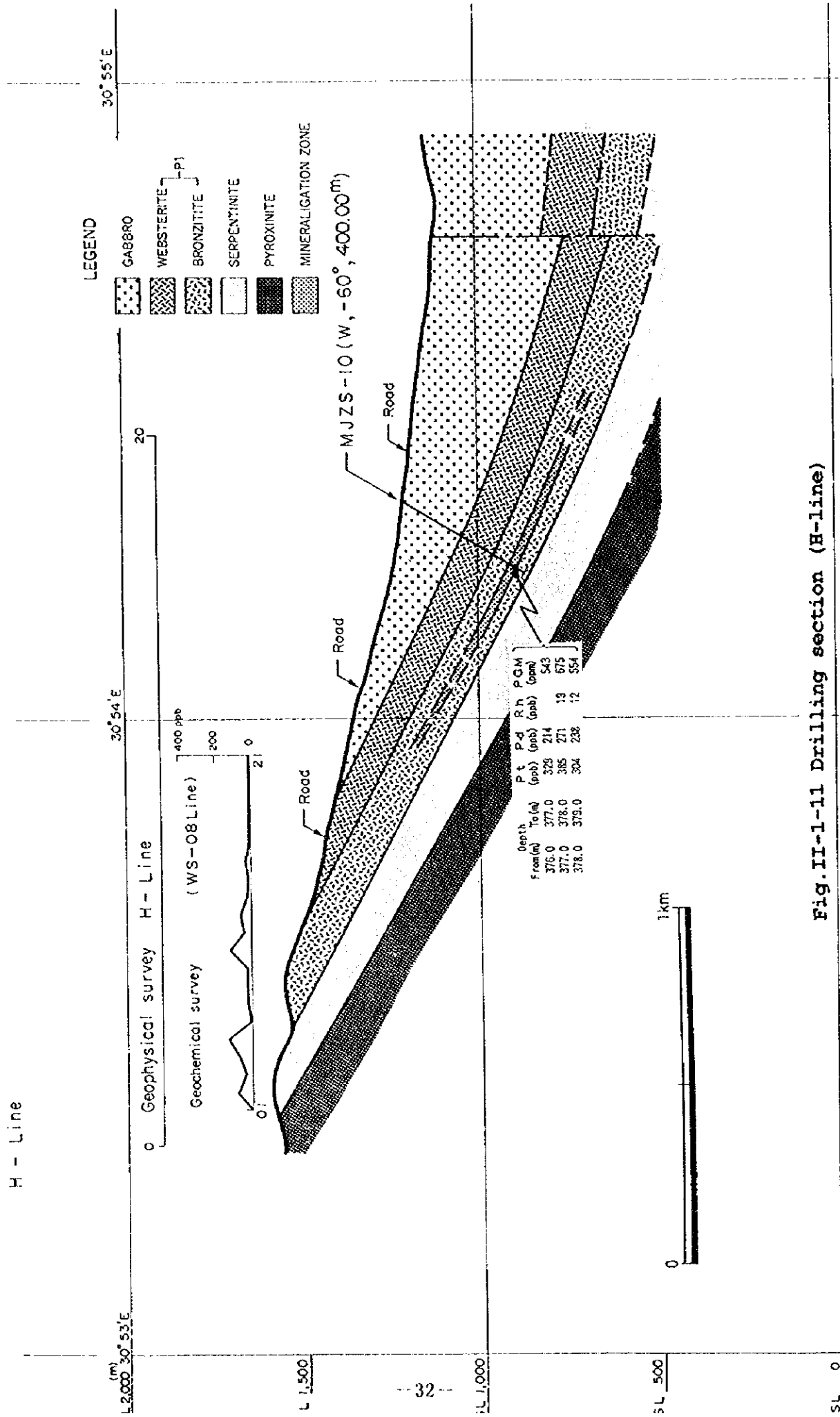


Fig.II-1-11 Drilling section (H-line)

TS-7 (394.50m) : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Mainly medium quantities of subhedral olivin which grain size generally shows around 5 to 1 mm, and include medium quantities of subhedral to anhedral orthopyroxene and clinopyroxene which grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of subhedral to anhedral phlogopite which grain size shows average 1 mm, and extremely small quantities of anhedral plagioclase and opaque minerals which grain size shows average 0.1 mm.

1-2-2 Mineralization

Geologic cross section by drilling were shown in Fig.II-1-7 to Fig.II-1-11. The results of microscopic observation for polished sections of ores are shown in Table II-1-10. the results of chemical analysis of ores are shown in Table II-1-11. The results of EPMA analysis are shown in Table II-1-12 and Log showing of chemical analysis of each holes are shown in Fig.II-1-12.

Summary of mineralization in each hole are as follows :

(1) MJZS-6

Sulphide dissemination is observed in the depth between 327m and 348m in the bronzitite layer which exist just under the serpentinite layer. This mineralization is mainly composed of pyrrhotite, chalcopyrite and accompany an extremely small quantity of pyrite. Grain size is maximum 2mm, generally less than 1mm and around 0.5mm. these minerals show euhedral usually and irregular anhedral mineral that fills a grain boundary is also recognized. The sulphide content is estimated maximum about 2%.

Though platinum group minerals can't be observed by naked eye, by the result of chemical analysis these minerals concentrate in the lowest portion (338m to 343m) of sulphide disseminate zone and show maximum platinum group elements content 692ppb.

Results of microscopic observation of ore polish section samples are as follows.

PS-6 (338.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Large quantities of subhedral orthopyroxene , small quantities of subhedral to anhedral clinopyroxene and medium quantities of euhedral to subhedral olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Extremely small quantities of anhedral plagioclase and opaque minerals which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite > chalcopyrite. Pyrrhotite shows irregular shape 0.1 to 2mm size. Pentlandite shows granular shape 0.05 to 0.1mm size. Chalcopyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other.

PS-7 (339.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Medium quantities of subhedral orthopyroxene ,clinopyroxene and olivin. these grain size shows average 5 to 1 mm.

Intercumulus minerals : Extremely small quantities of anhedral olivin, plagioclase and opaque minerals which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite > chalcopyrite. Pyrrhotite shows irregular shape 0.1 to 2mm size. Pentlandite shows granular and euhedral shape 0.05 to 0.1mm size. Chalcopyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other.

PS-8 (3451.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Medium quantities of subhedral orthopyroxene ,clinopyroxene and olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Intercumulus portion is filled by clay minerals and include extremely small quantities of anhedral opaque minerals which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite > chalcopyrite > Pyrite. Pyrrhotite shows irregular shape with around 0.2mm size. Pentlandite shows granular and euhedral shape with 0.05 to 0.1mm size. Chalcopyrite and Pyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other. Moncheite{(Pt,Pd)(Te,Bi)₂}, Sperrylite{(Pt,Rh)(As,Sb,S)₂} are recognized as a platinum group minerals, these two minerals show irregular shape with around 15 μm and is observed in boundary portion between sulphide and cumulate minerals

Table II-1-11 Results of chemical analysis of ore samples (1)

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
1	MJZS-6	SA-1	327.00	328.00	3	2.94	43	87	508	< 10	39	< 10	0.03	3,100
2	MJZS-6	SA-2	328.00	329.00	14	0.46	358	96	872	< 10	57	< 10	0.13	3,130
3	MJZS-6	SA-3	329.00	330.00	34	4.41	448	96	931	< 10	< 10	< 10	0.15	3,170
4	MJZS-6	SA-4	330.00	331.00	17	1.86	416	117	1,290	< 10	< 10	< 10	0.12	2,840
5	MJZS-6	SA-5	331.00	332.00	18	1.08	329	108	1,030	< 10	< 10	< 10	0.10	3,130
6	MJZS-6	SA-6	332.00	333.00	42	1.29	544	106	1,130	21	< 10	< 10	0.12	3,500
7	MJZS-6	SA-7	333.00	334.00	43	2.36	516	106	1,140	67	< 10	< 10	0.12	3,790
8	MJZS-6	SA-8	334.00	335.00	45	1.56	682	109	1,250	44	< 10	< 10	0.25	3,690
9	MJZS-6	SA-9	335.00	336.00	82	2.63	653	110	1,240	76	< 10	< 10	0.23	3,660
10	MJZS-6	SA-10	336.00	337.00	88	3.16	530	105	1,140	100	< 10	< 10	0.21	3,420
11	MJZS-6	SA-11	337.00	338.00	112	1.50	503	96	1,120	272	34	< 10	0.18	3,470
12	MJZS-6	SA-12	338.00	339.00	146	0.49	531	106	1,220	534	79	< 10	0.15	3,810
13	MJZS-6	SA-13	339.00	340.00	152	3.41	429	104	1,140	541	145	15	0.14	3,610
14	MJZS-6	SA-14	340.00	341.00	91	0.44	317	99	980	479	98	19	0.11	3,610
15	MJZS-6	SA-15	341.00	342.00	72	0.44	289	96	881	511	154	27	0.11	3,670
16	MJZS-6	SA-16	342.00	343.00	34	0.16	231	102	900	409	262	18	0.09	3,650
17	MJZS-6	SA-17	343.00	344.00	10	0.11	90	87	684	196	135	< 10	0.05	3,500
18	MJZS-6	SA-18	344.00	345.00	11	0.21	90	71	562	120	103	< 10	0.04	3,720
19	MJZS-6	SA-19	345.00	346.00	16	3.37	101	83	688	87	127	< 10	0.05	3,670
20	MJZS-6	SA-20	346.00	347.00	11	0.68	65	84	645	41	139	< 10	0.01	3,710
21	MJZS-6	SA-21	347.00	348.00	39	0.11	67	86	662	13	106	< 10	0.04	3,510

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
22	MJZS-7	SA-36	443.00	444.00	17	1.25	248	64	539	< 10	188	< 10	0.18	3,460
23	MJZS-7	SA-37	444.00	445.00	16	1.25	227	86	633	< 10	170	< 10	0.19	3,670
24	MJZS-7	SA-38	445.00	446.00	18	1.31	260	65	567	< 10	225	< 10	0.18	3,550
25	MJZS-7	SA-39	446.00	447.00	11	1.16	270	72	586	< 10	208	< 10	0.20	3,770
26	MJZS-7	SA-40	447.00	448.00	17	1.18	416	67	795	< 10	172	< 10	0.25	3,950
27	MJZS-7	SA-41	448.00	449.00	25	0.96	505	72	799	< 10	190	< 10	0.27	3,620
28	MJZS-7	SA-42	449.00	450.00	12	1.01	293	68	608	< 10	180	< 10	0.21	4,390
29	MJZS-7	SA-43	450.00	451.00	15	1.30	303	76	639	< 10	149	< 10	0.19	4,460
30	MJZS-7	SA-44	451.00	452.00	16	0.61	343	74	686	< 10	318	< 10	0.21	5,280
31	MJZS-7	SA-45	452.00	453.00	16	0.70	316	73	661	< 10	151	< 10	0.21	4,420
32	MJZS-7	SA-46	453.00	454.00	15	0.78	337	76	715	< 10	86	< 10	0.20	4,470
33	MJZS-7	SA-47	454.00	455.00	21	0.71	371	74	768	< 10	35	< 10	0.21	4,600
34	MJZS-7	SA-48	455.00	456.00	17	0.83	366	72	780	< 10	124	< 10	0.21	4,220

Table II-1-11 Results of chemical analysis of ore samples (2)

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
35	MJZS-7	SA-49	456.00	457.00	19	0.81	335	77	750	< 10	235	< 10	0.19	5,280
36	MJZS-7	SA-50	457.00	458.00	22	1.51	309	79	815	< 10	115	< 10	0.20	4,790
37	MJZS-7	SA-51	458.00	459.00	30	0.88	424	83	842	< 10	168	< 10	0.23	4,760
38	MJZS-7	SA-52	459.00	460.00	29	0.71	339	84	809	< 10	207	< 10	0.20	4,570
39	MJZS-7	SA-53	460.00	461.00	38	0.69	377	89	853	< 10	153	< 10	0.21	4,410
40	MJZS-7	SA-54	461.00	462.00	43	0.90	374	102	895	< 10	88	< 10	0.17	3,800
41	MJZS-7	SA-55	462.00	463.00	48	1.11	424	103	996	< 10	156	< 10	0.27	3,760
42	MJZS-7	SA-56	463.00	464.00	31	0.41	233	53	520	< 10	61	< 10	0.13	1,820
43	MJZS-7	SA-57	464.00	465.00	68	0.74	497	103	1,081	< 10	150	< 10	0.21	3,230
44	MJZS-7	SA-58	465.00	466.00	72	0.51	422	103	1,012	< 10	101	< 10	0.21	3,230
45	MJZS-7	SA-59	466.00	467.00	75	0.46	429	104	1,014	48	239	< 10	0.20	3,220
46	MJZS-7	SA-60	467.00	468.00	100	0.70	518	107	1,143	171	350	< 10	0.25	3,300
47	MJZS-7	SA-61	468.00	469.00	101	0.58	573	106	1,124	339	266	< 10	0.27	3,120
48	MJZS-7	SA-62	469.00	470.00	130	0.72	447	103	1,061	514	442	27	0.21	3,230
49	MJZS-7	SA-63	470.00	471.00	106	1.55	354	102	974	486	412	20	0.19	3,260
50	MJZS-7	SA-64	471.00	472.00	59	0.93	251	97	774	295	394	24	0.12	3,290
51	MJZS-7	SA-65	472.00	473.00	28	0.56	179	98	701	195	396	25	0.10	3,280
52	MJZS-7	SA-66	473.00	474.00	18	1.40	140	99	681	241	276	23	0.07	3,430
53	MJZS-7	SA-67	474.00	475.00	20	0.13	120	96	637	78	163	10	0.05	3,190
54	MJZS-7	SA-68	475.00	476.00	24	0.06	108	99	643	79	208	< 10	0.05	3,210
55	MJZS-7	SA-69	476.00	477.00	17	0.06	96	100	646	74	172	< 10	0.06	3,150
56	MJZS-7	SA-70	477.00	478.00	16	0.08	95	98	630	55	188	< 10	0.06	3,040
57	MJZS-7	SA-71	478.00	479.00	15	0.10	95	97	637	77	242	< 10	0.06	3,220
58	MJZS-7	SA-72	479.00	480.00	8	0.21	80	101	617	55	135	< 10	0.05	2,980
59	MJZS-7	SA-73	480.00	481.00	7	0.08	72	97	598	51	146	< 10	0.05	3,190
60	MJZS-7	SA-74	481.00	482.00	4	0.11	74	101	606	36	118	< 10	0.04	3,150
61	MJZS-7	SA-75	482.00	483.00	4	0.05	64	102	624	67	123	< 10	0.04	3,380
62	MJZS-7	SA-76	483.00	484.00	3	0.93	120	102	671	53	187	< 10	0.07	3,430
63	MJZS-7	SA-77	484.00	485.00	4	0.18	71	98	604	27	113	< 10	0.04	3,260

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
64	MJZS-8	SA-1	556.00	557.00	< 1	0.16	275	68	557	< 10	< 10	< 10	0.17	2,630
65	MJZS-8	SA-2	557.00	558.00	5	0.23	277	88	550	< 10	< 10	< 10	0.17	2,630
66	MJZS-8	SA-3	558.00	559.00	< 1	0.16	271	68	546	< 10	< 10	< 10	0.17	2,630
67	MJZS-8	SA-4	559.00	560.00	7	0.21	269	69	561	< 10	< 10	< 10	0.17	2,580
68	MJZS-8	SA-5	560.00	561.00	< 1	0.13	236	75	834	< 10	< 10	< 10	0.18	2,740

Table II-1-11 Results of chemical analysis of ore samples (3)

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
69	MJZS-8	SA-6	561.00	562.00	3	0.63	238	66	523	< 10	< 10	< 10	0.18	2,710
70	MJZS-8	SA-7	562.00	563.00	< 1	0.20	250	64	519	< 10	< 10	< 10	0.17	2,830
71	MJZS-8	SA-8	563.00	564.00	1	0.13	277	69	538	< 10	< 10	< 10	0.18	2,820
72	MJZS-8	SA-30	610.00	611.00	70	0.40	525	110	1,190	< 10	20	< 10	0.23	3,070
73	MJZS-8	SA-31	611.00	612.00	82	0.33	494	104	1,080	< 10	13	< 10	0.23	2,810
74	MJZS-8	SA-32	612.00	613.00	42	0.20	371	101	940	< 10	11	< 10	0.16	2,970
75	MJZS-8	SA-33	613.00	614.00	76	0.23	451	100	1,010	35	27	< 10	0.19	2,930
76	MJZS-8	SA-34	614.00	615.00	162	0.35	658	111	1,280	230	113	< 10	0.27	2,900
77	MJZS-8	SA-35	615.00	616.00	139	0.30	613	111	1,170	230	124	< 10	0.23	2,940
78	MJZS-8	SA-36	616.00	617.00	144	0.31	583	111	1,140	423	301	10	0.21	3,060
79	MJZS-8	SA-37	617.00	618.00	139	0.43	572	102	1,030	392	284	26	0.18	2,910
80	MJZS-8	SA-38	618.00	619.00	119	0.31	510	103	1,050	274	332	37	0.16	3,050
81	MJZS-8	SA-39	619.00	620.00	49	0.23	314	103	869	205	317	36	0.11	2,930
82	MJZS-8	SA-40	620.00	621.00	28	1.37	276	100	732	130	239	18	0.07	2,930
83	MJZS-8	SA-41	621.00	622.00	18	0.57	126	101	605	88	262	25	0.06	3,020
84	MJZS-8	SA-42	622.00	623.00	9	0.15	108	101	661	68	150	< 10	0.06	3,280
85	MJZS-8	SA-43	623.00	624.00	9	0.13	89	98	635	66	118	< 10	0.06	3,140
86	MJZS-8	SA-44	624.00	625.00	10	0.26	111	96	661	73	252	14	0.06	3,230
87	MJZS-8	SA-45	625.00	626.00	13	0.17	146	100	699	66	231	< 10	0.06	3,060

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
88	MJZS-9	SA-1	328.00	329.00	< 1	0.45	84	43	227	< 10	79	< 10	0.14	631
89	MJZS-9	SA-2	329.00	330.00	< 1	0.43	75	47	241	< 10	160	< 10	0.15	570
90	MJZS-9	SA-3	330.00	331.00	< 1	1.05	63	45	237	< 10	110	< 10	0.14	631
91	MJZS-9	SA-4	331.00	332.00	2	0.17	30	44	204	< 10	11	< 10	0.08	766
92	MJZS-9	SA-5	332.00	333.00	< 1	0.13	39	43	233	49	11	< 10	0.09	594
93	MJZS-9	SA-6	333.00	334.00	< 1	0.32	81	45	222	< 10	< 10	< 10	0.10	571
94	MJZS-9	SA-7	334.00	335.00	21	2.56	143	45	226	< 10	< 10	< 10	0.10	591
95	MJZS-9	SA-8	335.00	336.00	7	2.27	32	46	216	< 10	< 10	< 10	0.07	681
96	MJZS-9	SA-9	336.00	337.00	< 1	0.59	30	31	143	< 10	< 10	< 10	0.08	382
97	MJZS-9	SA-10	337.00	338.00	< 1	0.22	52	42	239	< 10	< 10	< 10	0.09	501
98	MJZS-9	SA-11	338.00	339.00	3	0.27	54	45	219	28	< 10	< 10	0.08	520
99	MJZS-9	SA-12	339.00	340.00	< 1	0.17	134	43	194	< 10	< 10	< 10	0.09	523
100	MJZS-9	SA-13	340.00	341.00	< 1	0.13	69	47	228	< 10	< 10	< 10	0.08	535
101	MJZS-9	SA-14	341.00	342.00	< 1	0.13	75	44	229	< 10	< 10	< 10	0.08	560
102	MJZS-9	SA-15	342.00	343.00	< 1	2.75	92	46	247	< 10	< 10	< 10	0.10	600

Table II-1-11 Results of chemical analysis of ore samples (4)

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
103	MJZS-9	SA-16	336.00	397.00	< 1	0.82	89	44	258	< 10	< 10	< 10	0.09	734
104	MJZS-9	SA-17	397.00	398.00	4	0.21	55	45	243	< 10	< 10	< 10	0.09	783
105	MJZS-9	SA-18	398.00	399.00	< 1	0.44	73	47	250	32	< 10	< 10	0.09	735

No.	Drill hole		Depth		Au (ppb)	Ag (ppm)	Cu (ppm)	Co (ppm)	Ni (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	Cr (ppm)
	Name	No.	From (m)	To (m)										
106	MJZS-10	SA-1	370.00	371.00	24	0.21	345	80	756	< 10	< 10	< 10	0.19	4,110
107	MJZS-10	SA-2	371.00	372.00	28	0.23	444	102	987	< 10	< 10	< 10	0.20	2,840
108	MJZS-10	SA-3	372.00	373.00	18	0.23	530	89	867	< 10	< 10	< 10	0.19	2,430
109	MJZS-10	SA-4	373.00	374.00	48	0.23	309	71	848	< 10	< 10	< 10	0.14	2,000
110	MJZS-10	SA-5	374.00	375.00	57	0.16	429	97	948	46	27	< 10	0.17	2,590
111	MJZS-10	SA-6	375.00	376.00	64	0.28	541	99	1,030	178	94	< 10	0.20	2,780
112	MJZS-10	SA-7	376.00	377.00	51	0.25	507	107	1,130	329	214	< 10	0.21	2,710
113	MJZS-10	SA-8	377.00	378.00	65	0.11	379	101	939	385	271	19	0.16	2,760
114	MJZS-10	SA-9	378.00	379.00	67	0.54	211	96	741	304	238	12	0.10	2,930
115	MJZS-10	SA-10	379.00	380.00	34	0.45	202	94	712	229	166	< 10	0.10	2,770
116	MJZS-10	SA-11	380.00	381.00	23	0.60	152	91	627	135	197	< 10	0.07	2,930
117	MJZS-10	SA-12	381.00	382.00	10	0.30	131	98	665	98	220	< 10	0.07	2,750
118	MJZS-10	SA-13	382.00	383.00	6	0.16	114	93	603	109	205	< 10	0.07	2,970
119	MJZS-10	SA-14	383.00	384.00	6	0.08	102	98	629	68	230	< 10	0.07	3,030
120	MJZS-10	SA-15	384.00	385.00	8	0.29	101	96	616	61	192	< 10	0.06	2,960
121	MJZS-10	SA-16	385.00	386.00	6	0.30	81	90	565	56	225	< 10	0.06	2,850
122	MJZS-10	SA-17	386.00	387.00	1	1.10	61	96	569	53	155	< 10	0.05	3,030
123	MJZS-10	SA-18	387.00	388.00	1	0.47	59	95	567	43	123	< 10	0.04	2,950
124	MJZS-10	SA-19	388.00	389.00	< 1	0.37	79	94	583	44	151	< 10	0.06	3,280
125	MJZS-10	SA-20	389.00	390.00	< 1	0.08	71	101	610	47	147	< 10	0.06	3,340
126	MJZS-10	SA-21	390.00	391.00	3	0.20	59	96	581	33	126	< 10	0.05	3,430
127	MJZS-10	SA-22	391.00	392.00	1	0.18	79	99	617	16	133	< 10	0.06	3,460
128	MJZS-10	SA-23	392.00	393.00	< 1	0.43	62	96	586	20	93	< 10	0.06	3,350
129	MJZS-10	SA-24	393.00	394.00	< 1	0.64	51	96	576	18	55	< 10	0.04	3,470
130	MJZS-10	SA-25	394.00	395.00	< 1	0.50	57	97	591	< 10	79	< 10	0.04	3,380
131	MJZS-10	SA-26	395.00	396.00	2	0.80	54	96	583	< 10	58	< 10	0.04	3,350
132	MJZS-10	SA-27	396.00	397.00	< 1	0.14	81	94	624	32	138	< 10	0.06	3,420
133	MJZS-10	SA-28	397.00	398.00	< 1	0.20	118	95	625	< 10	44	< 10	0.06	3,490
134	MJZS-10	SA-29	398.00	399.00	3	0.50	114	102	717	< 10	63	< 10	0.07	3,720
135	MJZS-10	SA-30	399.00	400.00	< 1	0.70	48	93	564	< 10	37	< 10	0.04	3,500

characteristically.

PS-9 (342.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular orthocumulate to adocumulate.

Cumulus minerals : Medium quantities of subhedral to anhedral orthopyroxene, clinopyroxene and olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Intercumulus portion is filled by clay minerals and include extremely small quantities of anhedral opaque minerals which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite = chalcopyrite. Pyrrhotite shows irregular shape. Pentlandite shows granular and euhedral shape. Chalcopyrite and Pyrite shows irregular shape. They show around 1 mm size and are observed closely assembled with each other.

(2) MJZS-7

Sulphide dissemination is observed from middle portion of the serpentinite to the bronzitite layer. Sulphide mineralization is not so strong in the serpentinite layer but becomes rather strong in the bronzitite layer. A kind of minerals, grain size and form of minerals are similar to MJZS-6 drilling. Sulphide content is estimated maximum approximately 5%.

Results of chemical analysis show platinum group element to be maximum 983 ppb. and concentrate in the lowest portion (468.00m-473.00m) of sulphide disseminated zone.

Results of microscopic observation of ore polished section samples are as follows.

PS-1 (468.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Large quantities of euhedral to subhedral orthopyroxene, medium quantities of subhedral clinopyroxene and small quantities of subhedral olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral opaque minerals, extremely small quantities of anhedral plagioclase and opaque minerals which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite > chalcopyrite > Pyrite. Pyrrhotite shows irregular shape with around 0.1 to 2mm

size. Pentlandite shows granular and euhedral shape with 0.05 to 0.1mm size. Chalcopyrite and Pyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other. Moncheite $\{(Pt,Pd)(Te,Bi)_2\}$ are recognized as a platinum group minerals, it shows irregular shape with around 30 μ m and is observed in boundary portion between pentlandite and chalcopyrite.

PS-2 (469.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Large quantities of subhedral orthopyroxene, medium quantities of subhedral clinopyroxene and olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of phlogopite with 5 to 1 mm grain size, small quantities of anhedral opaque minerals and extremely small quantities of anhedral plagioclase grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite > chalcopyrite > Pyrite. Pyrrhotite shows irregular shape with around 0.1 to 2mm size. Pentlandite shows granular and euhedral shape with 0.05 to 0.1mm size. Chalcopyrite and Pyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other.

PS-3 (470.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular orthocumulate to adocumulate.

Cumulus minerals : Large quantities of subhedral orthopyroxene, medium quantities of subhedral clinopyroxene and small quantities of olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral olivin with 5 to 1 mm grain size, small quantities of anhedral plagioclase and extremely small quantities of anhedral phlogopite and opaque minerals which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite = pentlandite > chalcopyrite = Pyrite. Pyrrhotite shows irregular shape with around 0.1 to 2mm size. Pentlandite shows granular and euhedral shape with 0.05 to 0.1mm size. Chalcopyrite and Pyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with

each other.

PS-4 (471.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Large quantities of euhedral orthopyroxene, medium quantities of subhedral clinopyroxene and small quantities of olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral olivin with 5 to 1 mm grain size, extremely small quantities of anhedral opaque minerals which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite = pentlandite = chalcopyrite > Pyrite. Pyrrhotite shows irregular shape with around 0.1 to 2mm size. Pentlandite shows granular and euhedral shape with 0.1mm size. Chalcopyrite and Pyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other.

PS-5 (472.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Large quantities of euhedral orthopyroxene, medium quantities of clinopyroxene and small quantities of olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral olivin and opaque minerals with 5 to 1 mm grain size, extremely small quantities of anhedral plagioclase which grain size shows average 1 to 0.1 mm.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite = pentlandite > chalcopyrite. Pyrrhotite shows irregular shape with around 0.2 to 3mm size. Pentlandite shows granular and euhedral shape with 0.1mm size. Chalcopyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other.

(3) MJZS-8

2 layers of sulphide dissemination zones are observed in this drilling. The upper one situated on the uppermost part (556.00m to 564.00m) of the bronzitite layer, another is situated in the depth of 610.00m to 626.00m. Platinum group elements are not accompanied in the upper sulphide zone, included in the lower sulphide zone. The kind of minerals, grain

size and form of minerals are similar to MJZS-6 and 7. Sulphide content is estimated maximum approximately from 1 to 2%.

The results of chemical analysis show platinum group element content reaching a maximum of 682 ppb and concentrate in the lowest portion (616m-619m) of sulphide disseminated zone.

Results of microscopic observation of ore polished section samples are as follows.

PS-10 (616.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Websterite

Texture : Holocrystalline equigranular orthocumulate to adocumulate.

Cumulus minerals : Large quantities of euhedral orthopyroxene and clinopyroxene, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral olivin, plagioclase and opaque minerals with 1 to 0.1 mm grain size.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite > chalcopyrite > Pyrite. Pyrrhotite shows irregular shape with around 0.2 to 4mm size. Pentlandite shows granular and euhedral shape with 0.1mm size. Chalcopyrite and pyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other.

PS-11 (617.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular adocumulate.

Cumulus minerals : Medium quantities of euhedral orthopyroxene and clinopyroxene, medium to small quantities of euhedral olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral plagioclase and opaque minerals, extremely small quantities of anhedral olivin with 1 to 0.1 mm grain size.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite > pentlandite > chalcopyrite = Pyrite. Pyrrhotite shows irregular shape with around 0.1 to 2mm size. Pentlandite shows granular and euhedral shape with 0.1mm size. Chalcopyrite and pyrite shows irregular shape with around 0.02 mm size. They are observed closely assembled with each other.

PS-12 (618.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Olivin websterite

Texture : Holocrystalline equigranular orthocumulate to

adocumulate.

Cumulus minerals : Medium quantities of euhedral to subhedral orthopyroxene and clinopyroxene, medium to small quantities of euhedral olivin, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral plagioclase and opaque minerals, extremely small quantities of anhedral olivin.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite = pentlandite = chalcopyrite = Pyrite.

(4) MJZS-9

2 sulphide small vein and dissemination zone are observed in this drill hole. The upper one is situated on the uppermost part of the bronzitite layer and shows about 18m(328.00m-343.00m) width, another is situated near the bottom of hole.

These sulphide mineralization are accompanied with small vein of calcite or sulphide dissemination around the calcite vein, by the results of chemical analysis, almost no platinum group elements are included in these two zone.

(5) MJZS-10

Sulphide dissemination is observed generally in the bronzitite layer, rather strong dissemination is recognized from 370m to around the bottom of hole.

This mineralization is same to MJZS-7 and mainly composed of pyrrhotite, chalcopyrite and accompanies an extremely small quantity of pyrite. Grain size is maximum 2mm, generally less than 1mm and around 0.5mm. these minerals show euhedral usually and irregular anhedral minerals that filled a grain boundary. The sulphide content is estimated maximum to be about 3 to 4%.

The results of chemical analysis show that platinum group elements concentrate in the lowest portion of sulphide disseminated zone and show maximum content 675 ppb.

Results of microscopic observation of ore polished section samples are as follows.

PS-13 (377.50m) : Disseminated ore in the bronzitite.

Rock name defined under microscope : Ortopyroxenite

Texture : Holocrystalline equigranular orthocumulate.

Cumulus minerals : Large quantities of subhedral orthopyroxene and small quantities of clinopyroxene, these grain size shows average 5 to 1 mm.

Intercumulus minerals : Small quantities of anhedral plagioclase and opaque minerals, extremely small quantities of

anhedral olivin and phlogopite with around 1 mm grain size.

Ore minerals : A variety and quantity of ore minerals (opaque minerals) are pyrrhotite = pentlandite > chalcopyrite > Pyrite.

Distribution of ore elements in each hole is shown in Fig.II-1-12. Distribution peak of 3 platinum group elements (platinum, palladium, rhodium) situate approximately at the same place and palladium has comparatively wide distribution to lower direction. Gold has a similar distribution form to platinum group elements and its peak is situated just on the upper part of platinum group elements. Silver doesn't show a characteristic distribution form against gold and platinum group elements. Copper and sulphur have similar distribution form and characteristically decrease their content from where platinum group elements distribute to lower portion. Cobalt and Nickel have similar gentle distribution form and a wide distribution peak is formed in the upper part from where platinum group elements distribute. Chrome has about same content through mineralization zone.

EPMA quantitative analysis was carried out for typical ore samples. Number of samples are 13, platinum group minerals were defined in two samples and analyzed point are total 7 points. Results of this analysis are shown in Table II-1-12.

Main Mineral assemblage in this area is pyrrhotite - pentlandite - chalcopyrite - pyrite.

Moncheite{(Pt,Pd)(Te,Bi)₂} and Sperrylite{(Pt,Rh)(As,Sb,S)₂} were observed as a platinum group ore minerals in microscopic observation and EPMA analysis. These minerals show irregular shape with 10 30 μ m size and exist in boundary between pentlandite and chalcopyrite or sulphide minerals and cumulus mineral (orthopyroxene).

Previous work points out that merenskyite (PdTe₂) and holligworthite (RhAs₂) are observed as other platinum group minerals (E.P.O.645) (M.D.Prondergast and A.H.Wilson, 1989).

1-3 Considerations

Exploration work in this area was carried out by UNION CARBIDE (E.P.O.193) and CLUFF (E.P.O.654), mineralization zone of platinum group elements were encountered.

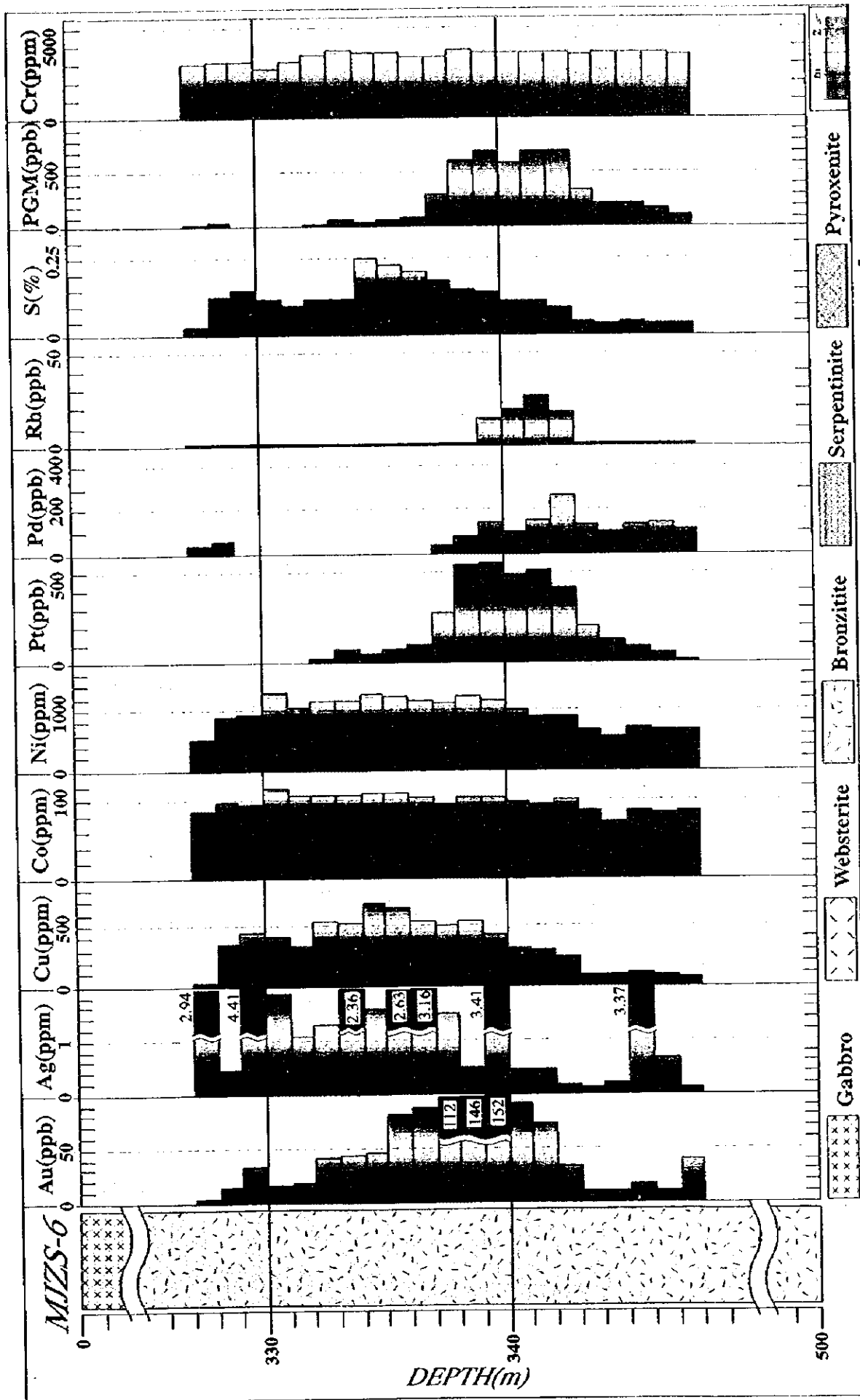


Fig.II-1-12 Log showing of Chemical analysis of ore samples (MJZS-6)



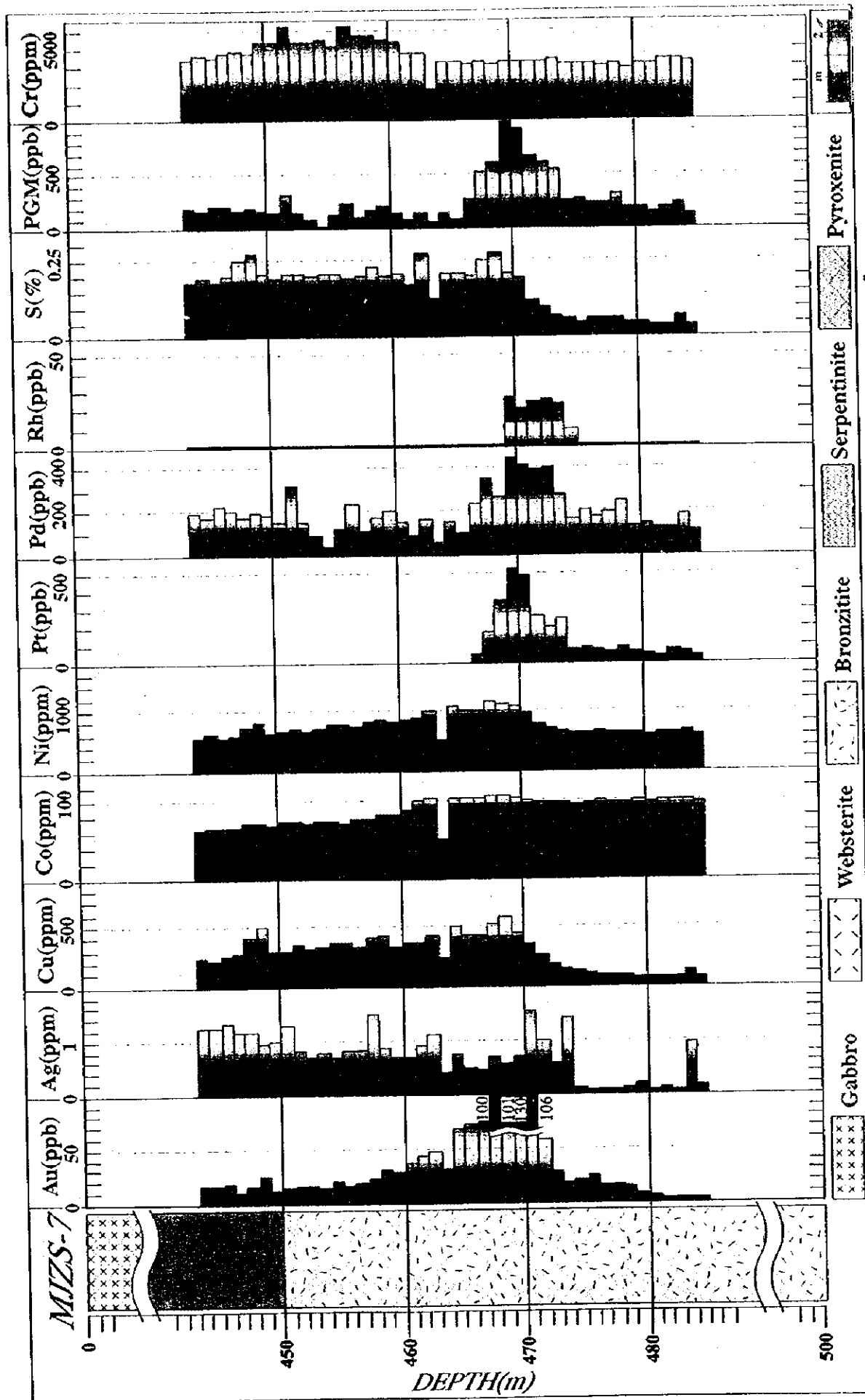


Fig. II-1-12 Log showing of Chemical analysis of ore samples (MJS-7)





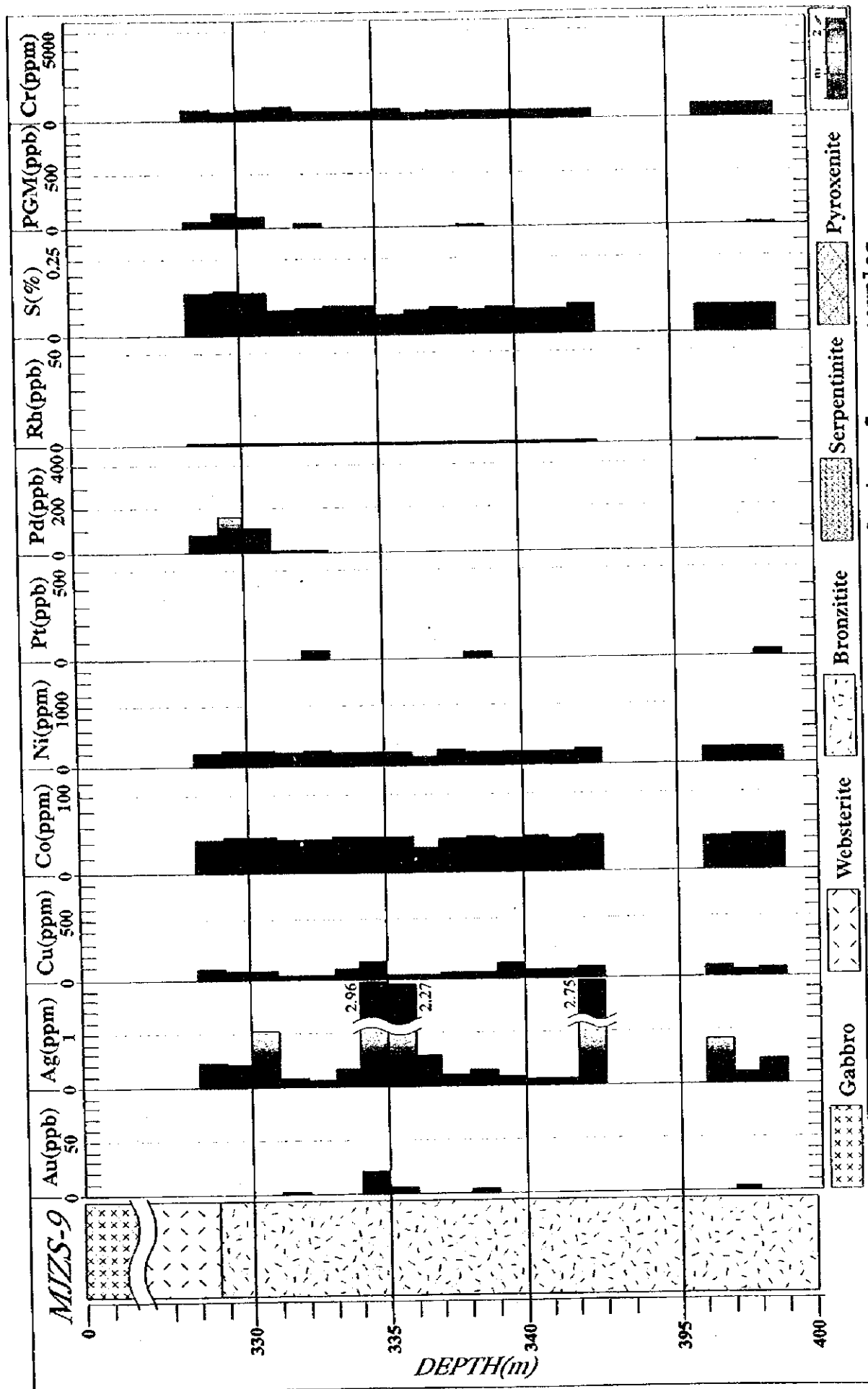


Fig. II-1-12 Log showing of Chemical analysis of ore samples (MJZS-9)



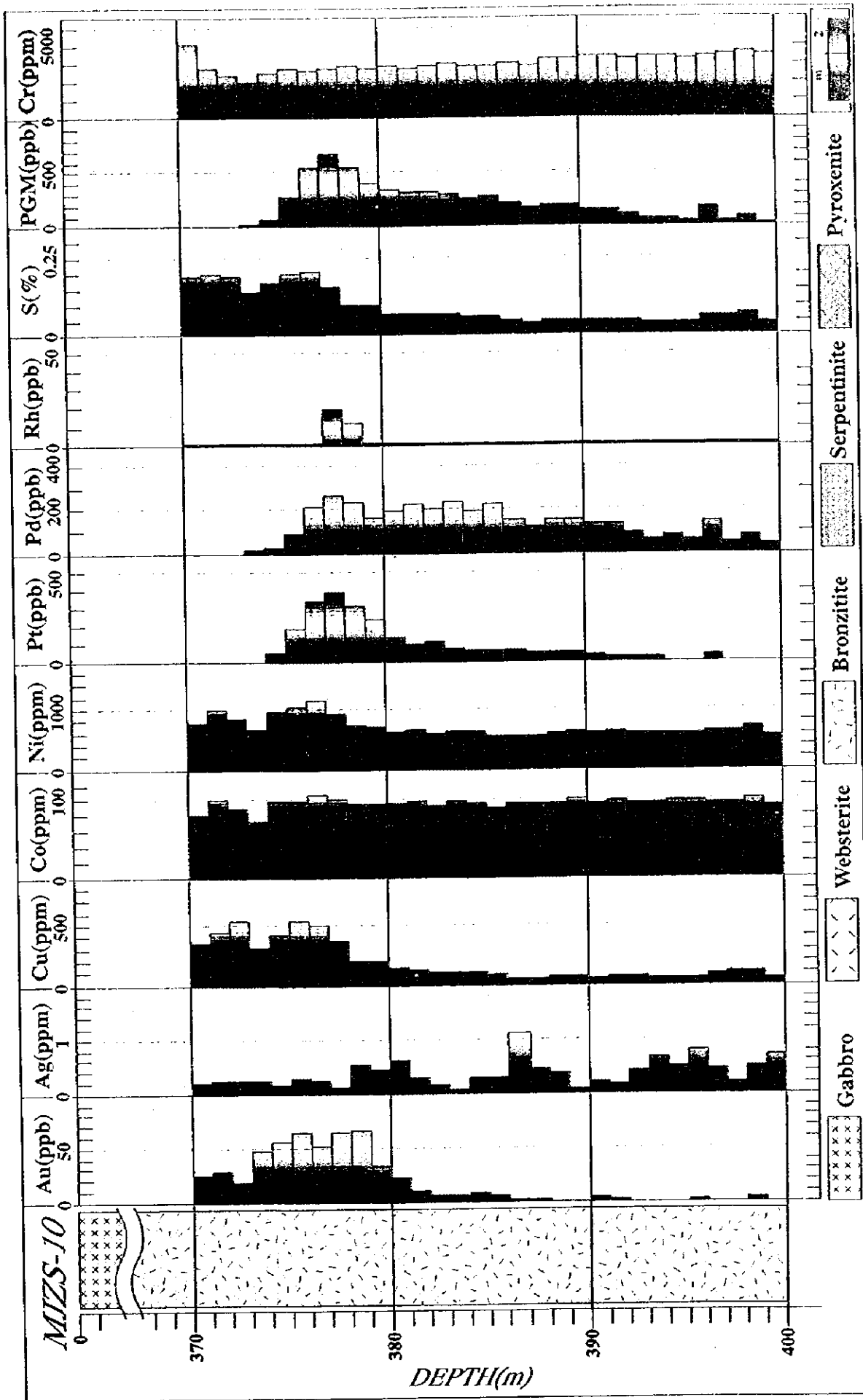


Fig.II-1-12 Log showing of Chemical analysis of ore samples (MJZS-10)



Table II-1-12. Results of EPMA quantitative analysis

Sample No.	Ps-1	Ps-1	Ps-1	Ps-8	Ps-8	Ps-8	Ps-8
mineral name	moncheite	moncheite	moncheite	sperrylite	sperrylite	moncheite	moncheite
size (μm)	29 * 22	29 * 22	29 * 22	9 * 6	9 * 6	15 * 12	15 * 12
weight %							
Pt	30.11	30.50	29.76	57.15	55.21	39.05	38.75
Pd	6.64	6.74	6.76	-	-	-	-
Bi	16.49	16.11	16.38	-	-	24.63	16.13
Te	46.17	45.93	46.87	-	-	35.65	44.32
As	-	-	-	42.60	43.75	-	-
Total	99.42	99.28	99.77	99.75	98.96	99.33	99.20
atomic ratio							
Pt	0.235	0.238	0.231	0.340	0.326	0.335	0.319
Pd	0.095	0.097	0.096	-	-	-	-
Bi	0.120	0.117	0.118	-	-	0.197	0.124
Te	0.550	0.548	0.555	-	-	0.468	0.557
As	-	-	-	0.660	0.674	-	-
Sum	1.000	1.000	1.000	1.000	1.000	1.000	1.000

-: below detection limits

Analyses conditions

X-ray take-off angle 52.5
 Acc. voltage 20 kV
 sample current 10 nA on MgO
 standard materials pure metal for Pt, Pd, Bi, Te
 GaAs for As
 characteristic X-ray Pt $M\alpha$, Pd $L\alpha$, Bi $L\alpha$, Te $L\alpha$, As $L\alpha$

*) PS-1: MJZS-7, 468.50m
 PS-8: MJZS-6, 341.50m

Trough Phase II and III survey, Mineralization of PGM was encountered by all drill holes. It is considered that PGM occur in upper most of bronzitite zone and this area may have a continuous mineralization zone similar to other platinum mining areas along the Great Dyke.

Moncheite and Sperrylite are observed as a PGM minerals, they are closely assemblaged with sulphide minerals like a pyrrhotite, Pentlandite, chalcopyrite, etc., and occur especially boundary portion between pentlandite and chalcopyrite or sulphide minerals and cumulus minerals.

Host rock of mineralization is the bronzitite which include large quantities of orthopyroxene in the field, however, it is olivin websterite lithologically because it include some amount of clinopyrixene and olivin under the microscopic observation.

Distribution zone of PGM situate in the lowest portion of sulphide mineralization zone, these concentration peak does not always situate at the same place. Regarding to difference between both concentration zone of sulphides and PGM, the tendency of decreasing of clinopyroxene is recognized in the PGM mineralization zone by microscopic observation however it is difficult to decide its boundary by naked eye.

Through Phase II and III survey, maximum thickness of sulphide mineralization zone is 42m(MJZS-7) but maximum metal content of PGM is about 1 g/t. On the other hand, the Hartley Mine which developed recently published their ore reserves and grading as follows (Introducing Hartley Platinum, Zimbabwe : BHP Joint Venture with Delta Gold N. L.).

Reserves	:	50.9 million tonnes (proven and probable)
Grading	:	2.64 g/t Platinum 1.8 g/t Palladium
		0.21 g/t Rhodium 0.47 g/t Gold
		0.17 % Nickel 0.14 % Copper
Another	:	116 million tonnes of resource has been identified from diamond drilling

Snake Head area is generally low grade of PGM compared with the Hartley Mine, it is considered that the grade of concentration of PGM may be low in this survey area, and in addition, this area is under poor infrastructure, some difficulty may exist to develop a new mine at present.

Previous works are pointing out following things.

Great Dyke has a ship bottom structure in transverse direction, cyclic units of each formation decrease their thickness in both rim portion and increase their thickness in axial portion (Allan H. Wilson and Marian Tredoux 1990). The form and thickness of mineralization zone are about similar at all platinum mining area in Great Dyke (M.D.Prendargast and Reid R. Keays 1989). In the case of rim portion of Great Dyke, MSZ decrease the thickness(2.3m) shows high metal content, and mineralization zone of PGM become about 1.5m in MSZ, in the case of axial portion, MSZ shows comparatively low grade and become more than 20m thickness (M.D.Prendargast and A.H.wilson 1989).

It may be consider that the result of drilling is reflecting the characteristics of Great Dyke as the reason why the metal content is comparatively low.

Chapter 2 Consideration of the survey result

2-1 Controls on mineralization related to the geological structure and characteristics of the mineralization

In this area, upper gabbroic rocks are widely distributed in the center portion of the survey area. Rock facies move to lower peridotite (dunite, harzburgite) passing through multi layered pyroxenite.

The sulphide mineralization which can be observed by the naked eye mainly occur in the P1 layer of the upper most pyroxenite layer. Chromite occurs mainly in the lower pyroxenite layer.

Sulphide minerals in the mineralized zone consist of pyrrhotite, pentlandite, chalcopyrite as essential minerals and pyrite. Moncheite and Sperrylite are observed as a PGM minerals, they are closely assemblaged with sulphide minerals and occur especially boundary portion between pentlandite and chalcopyrite or sulphide minerals and cumulus minerals.

2-2 Results of drilling and mineralization

Trough Phase II and III survey, Mineralization of PGM was encountered by all drill holes. It is considered that PGM occur in upper most of bronzitite zone and this area may have a continuous mineralization zone similar to other platinum mining areas along the Great Dyke.

A summary of the sulphide mineralization zone of each hole which can be observed by the naked eye are as follows.

Hole No.	Depth(m)	Mineralization	Main Sulphides
MJZS-6	327.00~348.00	disseminate	Po, Pn, Cp, Py,
MJZS-7	443.00~485.00	disseminate	Po, Pn, Cp, Py,
MJZS-8	556.00~564.00	disseminate	Po, Pn, Cp, Py,
MJZS-8	610.00~626.00	disseminate	Po, Pn, Cp, Py,
MJZS-9	331.00~343.00	disseminate	Po, Pn, Cp, Py,
MJZS-9	396.00~399.00	disseminate	Po, Pn, Cp, Py,
MJZS-10	370.00~400.50	disseminate	Po, Pn, Cp, Py,

Metal content of the platinum group elements in the sulphide mineralization zone is as follows.

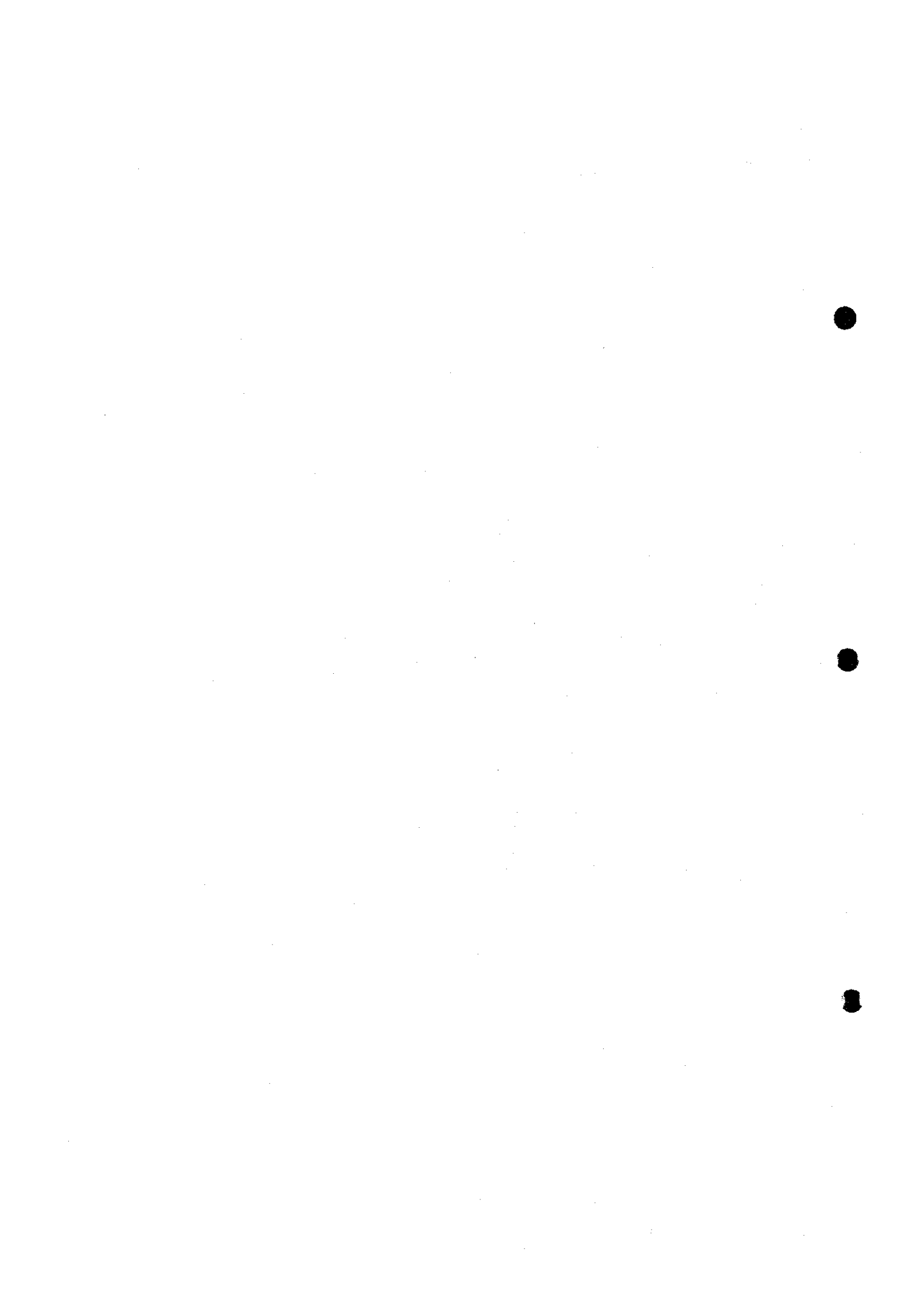
Hole No.	Depth(m)	Pt(ppb)	Pd(ppb)	Rh(ppb)	PGM(ppb)
MJZS-6	338.00~339.00	534	79	--	613
MJZS-6	339.00~340.00	541	145	15	701
MJZS-6	341.00~342.00	511	154	27	692
MJZS-6	342.00~343.00	409	262	18	689
MJZS-7	468.00~469.00	339	266	--	605
MJZS-7	469.00~470.00	514	442	27	983
MJZS-7	470.00~471.00	486	412	20	918

Hole No.	Depth(m)	Pt (ppb)	Pd (ppb)	Rh (ppb)	PGM (ppb)
MJZS-7	471.00~472.00	256	394	24	673
MJZS-7	472.00~473.00	195	398	25	619
MJZS-8	616.00~617.00	423	301	10	734
MJZS-8	617.00~618.00	392	264	26	682
MJZS-8	618.00~619.00	274	332	37	643
MJZS-10	376.00~377.00	329	214	--	543
MJZS-10	377.00~378.00	384	271	19	675
MJZS-10	378.00~379.00	304	238	12	553

2-3 Potential of ore deposits

Snake Head area is generally low grade of PGM compared with the Hartley Mine, it is considered that the grade of concentration of PGM may be low in this survey area, and in addition, this area is under poor infrastructure, some difficulty may exist to develop a new mine at present.

Part III Conclusion and recommendation



Part III Conclusion and recommendation

Chapter 1 Conclusion

Based on the study of results of Phase II survey, A probability of the existence of platinum ore deposit was indicated in the WS area. Drilling exploration of 5 holes was carried out in this area in order to encounter the mineralization zone and find a new ore deposit.

A summary of the drilling are as follows.

MJZS-6 (W, -60degree)	450.00m
MJZS-7 (W, -60degree)	500.00m
MJZS-8 (W, -60degree)	650.00m
MJZS-9 (W, -70degree)	400.00m
MJZS-10(W, -60degree)	400.00m
Total(5 holes)	2,400.00m

A summary of the sulphide mineralization zone of each hole which can be observed by the naked eye are as follows.

Hole No.	Depth(m)	Mineralization	Main Sulphides
MJZS-6	327.00~348.00	disseminate	Po, Pn, Cp, Py,
MJZS-7	443.00~485.00	disseminate	Po, Pn, Cp, Py,
MJZS-8	556.00~564.00	disseminate	Po, Pn, Cp, Py,
MJZS-8	610.00~626.00	disseminate	Po, Pn, Cp, Py,
MJZS-9	331.00~343.00	disseminate	Po, Pn, Cp, Py,
MJZS-9	396.00~399.00	disseminate	Po, Pn, Cp, Py,
MJZS-10	370.00~400.50	disseminate	Po, Pn, Cp, Py,

Maximum metal content of the platinum group elements in the sulphide mineralization zone is as follows.

Hole No.	Depth(m)	Pt(ppb)	Pd(ppb)	Rh(ppb)	PGM(ppb)
MJZS-6	339.00~340.00	541	145	15	701
MJZS-6	341.00~342.00	511	154	27	692
MJZS-7	469.00~470.00	514	442	27	983
MJZS-7	470.00~471.00	486	412	20	918
MJZS-8	616.00~617.00	423	301	10	734
MJZS-8	617.00~618.00	392	264	26	682
MJZS-10	377.00~378.00	384	271	19	675

Through Phase II and III survey, maximum thickness of sulphide mineralization zone is 42m(MJZS-7) but maximum metal content of PGM is about 1 g/t. On the other hand, the Hartley Mine which developed recently published their ore reserves and grading as follows.

Reserves : 50.9 million tonnes (proven and probable)
Grading : 2.64g/t Pt, 1.8g/t Pd. 0.21g/t Rh, 0.47g/t Au,

Snake Head area is generally low grade of PGM compared with the Hartley Mine, it is considered that the grade of concentration of PGM may be low in this survey area, it could not be attained to discover the new ore deposit that can expect to develop at present.

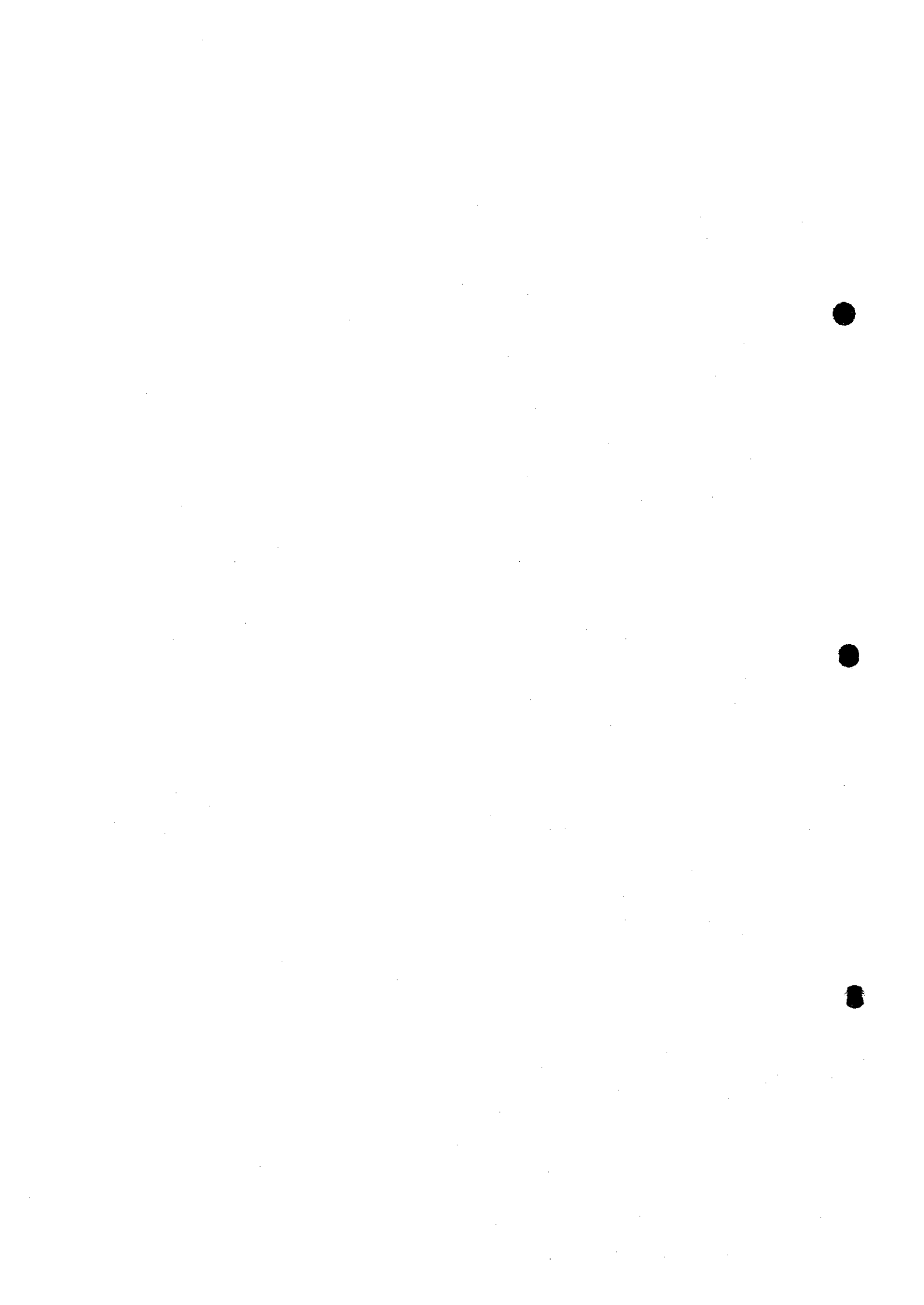
Chapter 2 Recommendations for the future

According to conclusions obtained through the survey results in Phase I to III, the following program will be proposed.

(1) Drilling survey must be carried out in the north-eastern portion of the WN area and the northern portion of the CB area in order to study the probability of the existence of the platinum ore deposit.



References

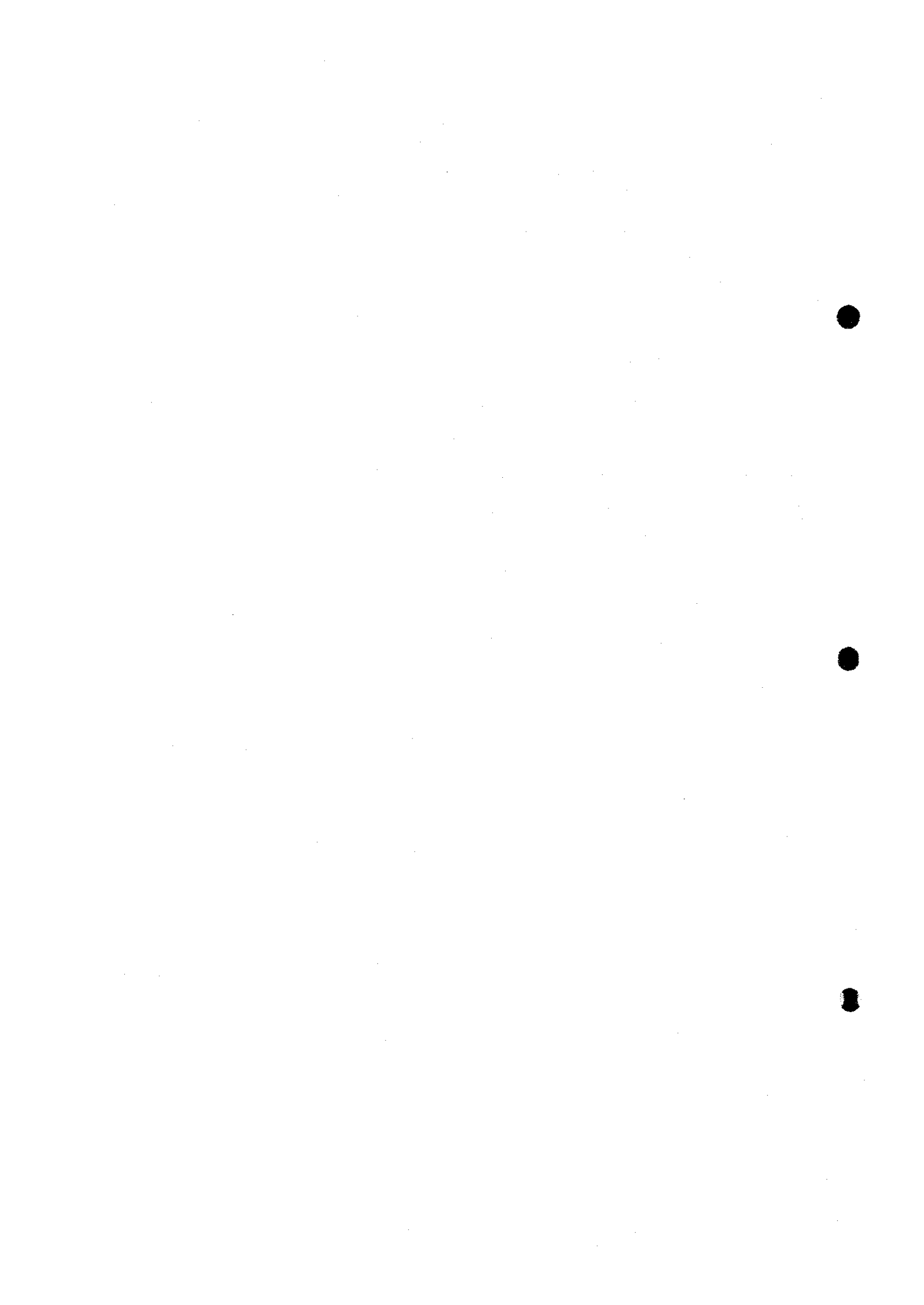


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Appendices



A-1 Microphotographs of the thin sections

Abbreviations of mineral names in the plate

Cpx : Clinopyroxene

Opx : Orthopyroxene

Olv : Olivine



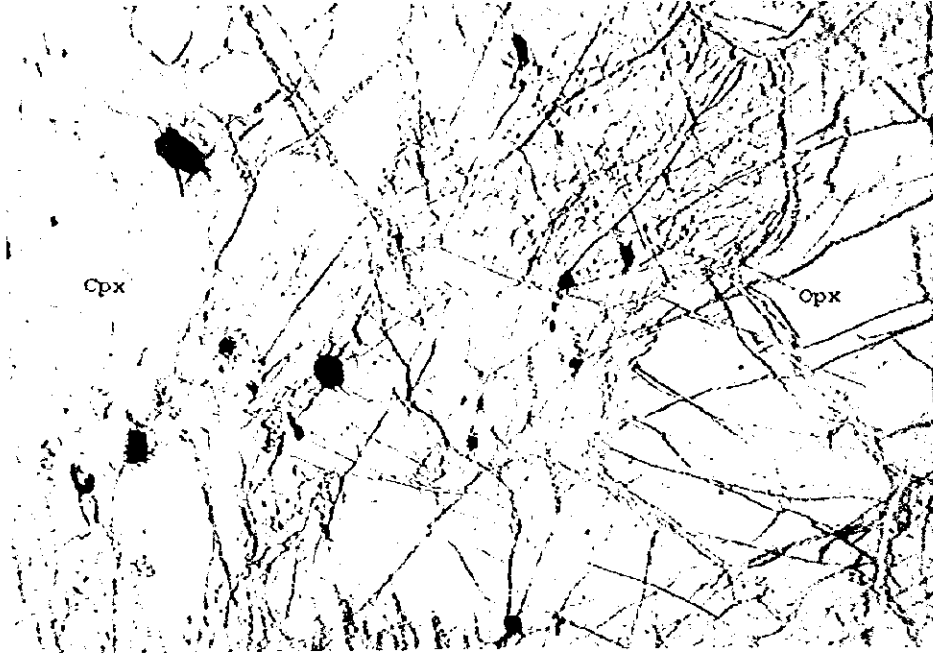
Microphotographs of the thin section

Sample No. TS-1 (MJZS-7 448.50 m)

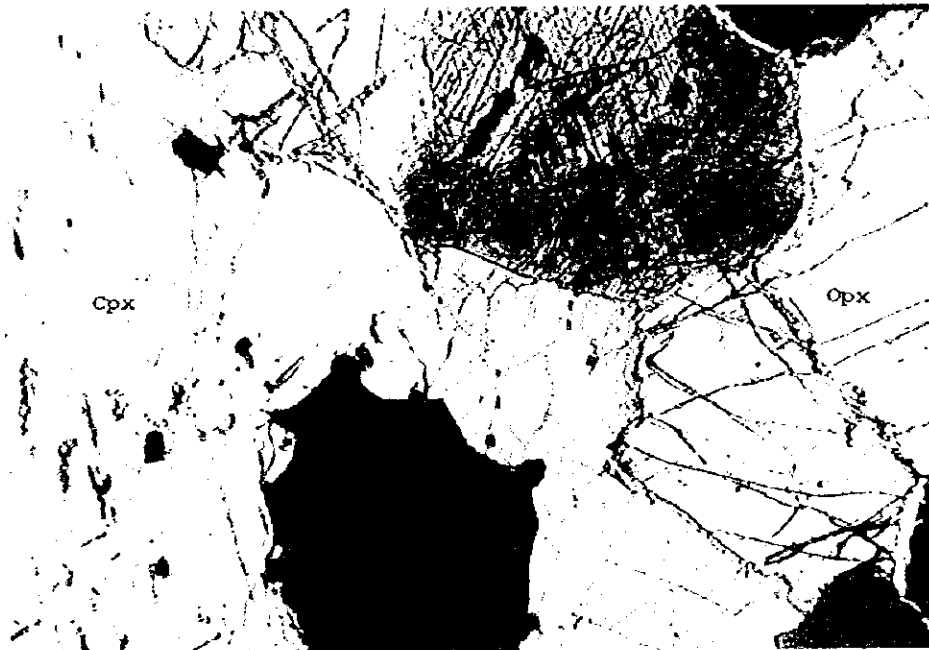
Location : Zimbabwe Snake Head Area

Rock name : Olivin-Websterite

PPL



XPL



Scale 1mm





A-2 Microphotographs of the polished sections

Abbreviations of mineral names in the plate

Po : Pyrrhotite

Pn : Pentlandite

Cp : Chalcopyrite

Py : Pyrite



Microphotographs of the polished section

Sample No. PS-1 (MJZS-7 468.50 m)

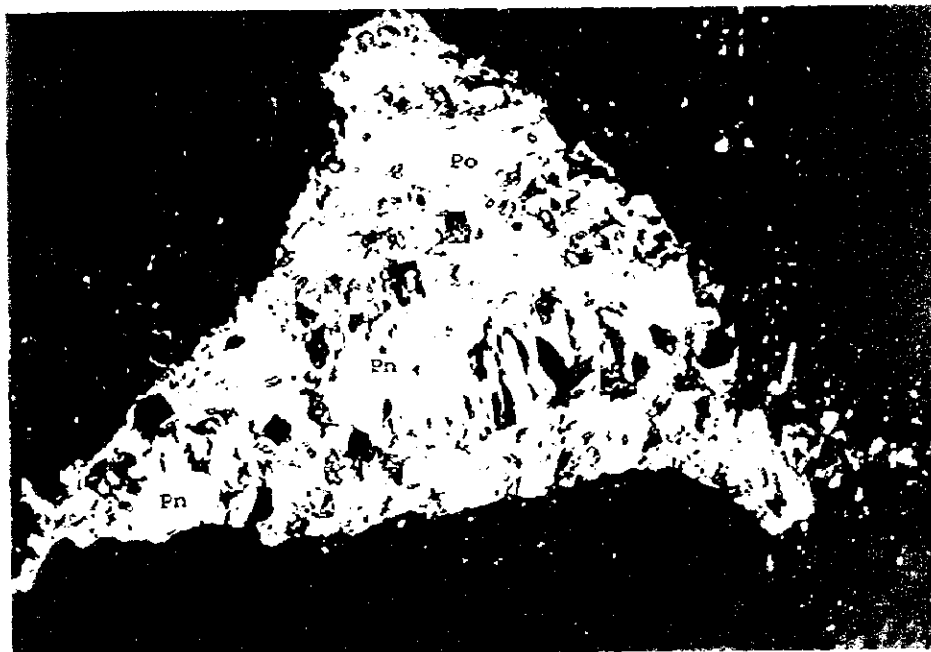
Location : Zimbabwe Snake Head Area

Rock name : Olivin-Websterite (Sulphide disseminated ore)

PPL



PPL



Scale 0.2mm





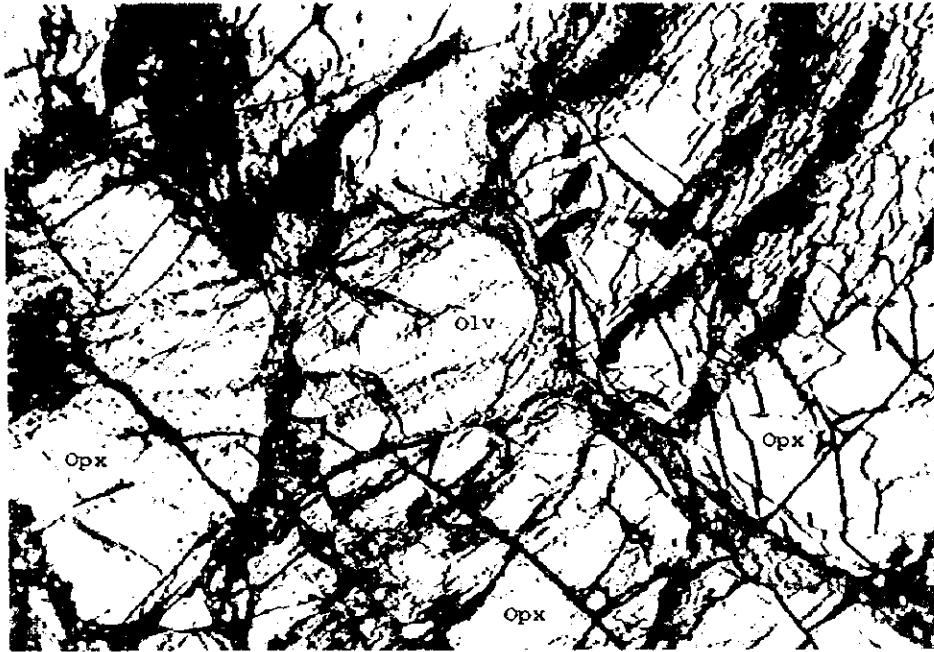
Microphotographs of the polished section

Sample No. PS-1 (MJZS-7 468.50 m)

Location : Zimbabwe Snake Head Area

Rock name : Olivin-Websterite

PPL



XPL



Scale 1mm





Microphotographs of the polished section

Sample No. PS-8 (MJZS-6 341.50 m)

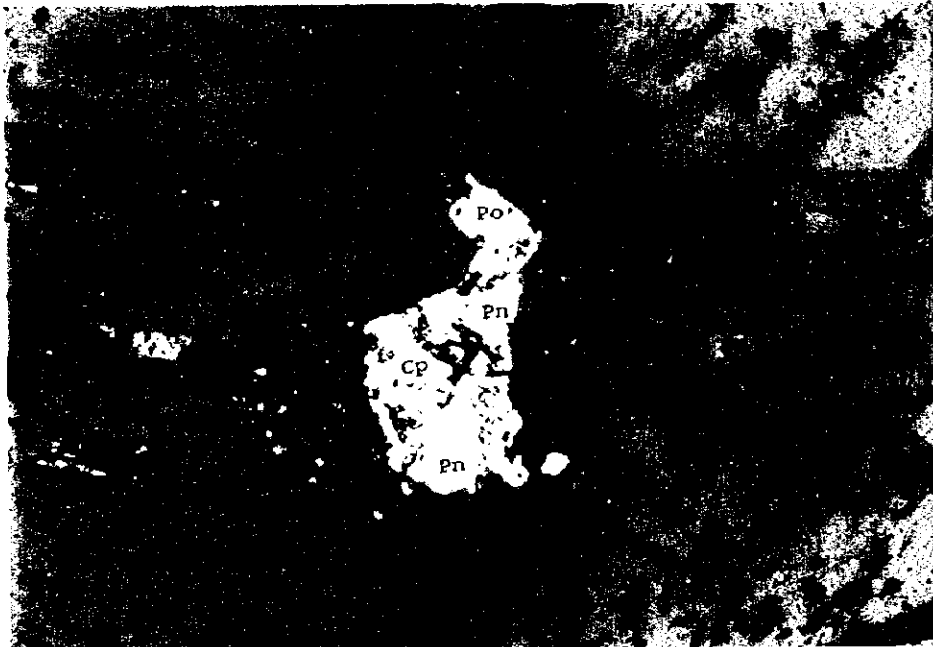
Location : Zimbabwe Snake Head Area

Rock name : Olivin-Websterite (Sulphide disseminated ore)

PPL



PPL



Scale 0.2mm





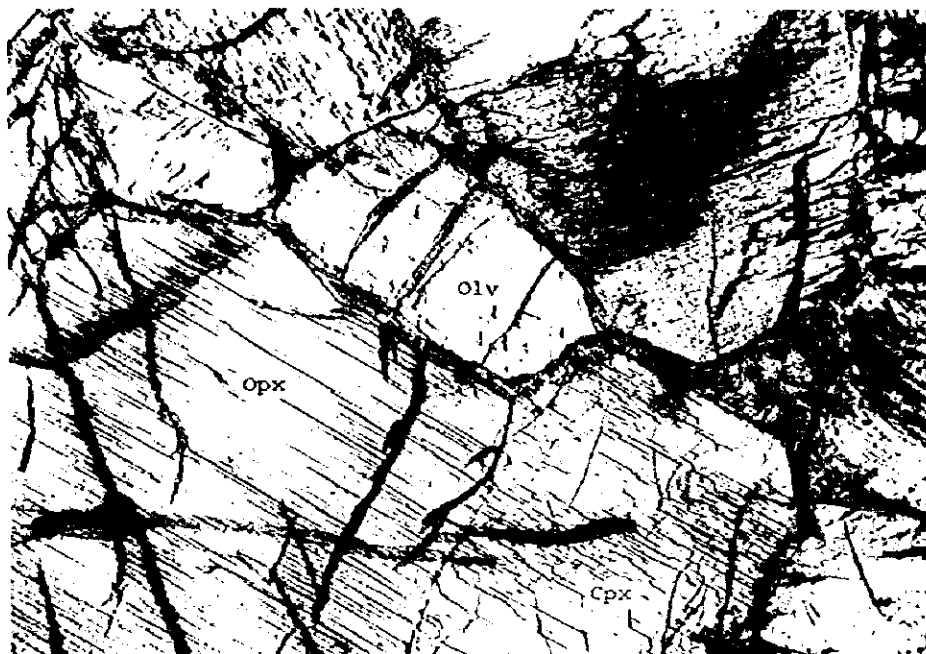
Microphotographs of the polished section

Sample No. PS-8 (MJZS-6 341.50 m)

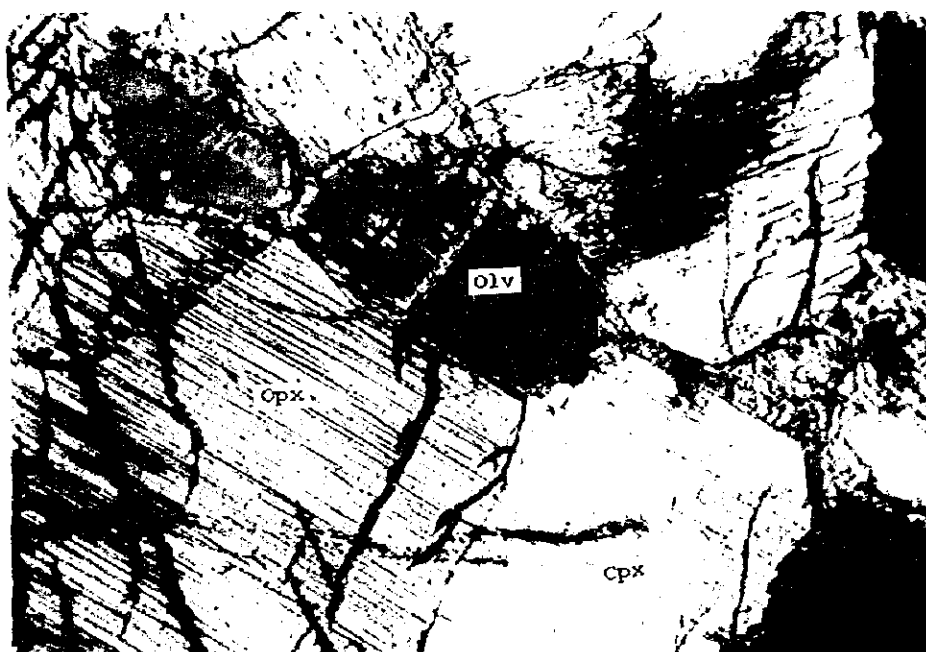
Location : Zimbabwe Snake Head Area

Rock name : Olivin-Websterite

PPL



XPL



Scale 1mm 



A-3 Results of drillings



Table II-1-5 Results of drilling (MJZS-6)

Class	Drilling Period				Specifications of Working Days							
	Working Period				Total Working Days				True Working Days			
	Starting Date ~ Finishing Date				Days	Shift	Days	Shift	Days	Shift	A-shift	#
Preparation	97/07/10 ~ 97/07/10				1	1	0	0	1	1	0	5
Drilling	97/07/11 ~ 97/08/01				22	22	0	0	22	22	17	110
Withdraw	97/08/02 ~ 97/08/10				9	9	0	0	9	9	0	45
Total	97/07/10 ~ 97/08/10				32	32	0	0	32	32	17	160
Drilling Depth				Core Recovery per each 100m								
Planned Depth	450.00 m	Overburden		Depth (m)	Core Length and Core Recovery			Cumulative Total				
Additional Depth	0.00 m	Core Length	439.50 m	0.00 ~ 38.30	27.80 m	72.68 %		72.68 %				
Total Depth	450.00 m	Recovery	97.67 %	38.30 ~ 127.80	89.50 m	100.00 %		91.78 %				
Working Time				Core Recovery per each 100m								
Drilling time	136.0 h	61.5 %	42.6 %	127.80 ~ 229.80	102.00 m	100.00 %		95.43 %				
Trip, Core recover, Casing, Reaming, etc.,	30.0 h	13.6 %	9.4 %	229.80 ~ 313.80	84.00 m	100.00 %		95.65 %				
Fishing job	40.0 h	18.1 %	12.5 %	313.80 ~ 415.80	102.00 m	100.00 %		97.47 %				
Water supply	15.0 h	6.8 %	4.7 %	415.80 ~ 450.00	34.20 m	100.00 %		97.67 %				
Others	0.0 h	0.0 %	0.0 %	Drilling Efficiency								
Sub-Total	221.0 h	100.0 %	69.3 %	T-Depth(m)/T-Working Days				14.06	m/Day			
Moved Out and In				T-Depth(m)/T-Working Shifts				14.06	m/Shift			
Rig Up	26.0 h		8.2 %	T-Depth(m)/True-Working Days				14.06	m/Day			
Tear Down	72.0 h		22.6 %	T-Depth(m)/True-Working Shifts				14.06	m/Shift			
Total	319.0 h		100.0 %	T-Depth(m)/T-Drilling Days				20.45	m/Day			
Casing				T-Depth(m)/T-Drilling Shifts				20.45	m/Shift			
Casing Depth and Size	Casing Ratio	Casing Pipe Recovery		T-Depth(m)/True-Drilling Days				20.45	m/Day			
(m)	(%)	(m)	(%)	T-Depth(m)/True-Drilling Shifts				20.45	m/Shift			
86 mm 20.50 m	4.6	17.00	82.9	T-Depth(m)/True-Drilling Shifts				26.47	m/Shift			
0 mm 0.00 m	0.0	0.00		T-Depth(m)/T-Workers				2.81	m/Worker			
				Actual Drilling Workers/T-Depth(m)				0.19	Worker/m			

Table II-1-6 Results of drilling (MJZS-7)

Class	Drilling Period				Specifications of Working Days							
	Working Period				Total Working Days				True Working Days			
	Starting Date ~ Finishing Date				Days	Shift	Days	Shift	Days	Shift	A-shift	#
Preparation	97/06/18 ~ 97/06/20				3	3	0	0	3	3	0	15
Drilling	97/06/21 ~ 97/07/15				25	25	1	1	24	24	24	120
Withdraw	97/07/16 ~ 97/07/20				5	5	0	0	5	5	0	25
Total	97/06/18 ~ 97/07/20				33	33	1	1	32	32	24	160
Drilling Depth				Core Recovery per each 100m								
Planned Depth	500.00 m	Overburden		Depth (m)	Core Length and Core Recovery			Cumulative Total				
Additional Depth	0.00 m	Core Length	492.00 m	0.00 ~ 18.50	10.50 m	56.76 %		56.76 %				
Total Depth	500.00 m	Recovery	98.40 %	18.50 ~ 110.00	91.50 m	100.00 %		92.73 %				
Working Time				Core Recovery per each 100m								
Drilling time	184.0 h	59.9 %	50.7 %	110.00 ~ 200.00	90.00 m	100.00 %		95.00 %				
Trip, Core recover, Casing, Reaming, etc.,	47.0 h	15.3 %	12.9 %	200.00 ~ 305.00	105.00 m	100.00 %		97.38 %				
Fishing job	12.0 h	3.9 %	3.3 %	305.00 ~ 404.00	99.00 m	100.00 %		98.02 %				
Water supply	24.0 h	7.8 %	6.6 %	404.00 ~ 500.00	96.00 m	100.00 %		98.40 %				
Others	40.0 h	13.0 %	11.0 %	Drilling Efficiency								
Sub-Total	307.0 h	100.0 %	84.6 %	T-Depth(m)/T-Working Days				15.15	m/Day			
Moved Out and In				T-Depth(m)/T-Working Shifts				15.15	m/Shift			
Rig Up	24.0 h		6.6 %	T-Depth(m)/True-Working Days				15.63	m/Day			
Tear Down	32.0 h		8.8 %	T-Depth(m)/True-Working Shifts				15.63	m/Shift			
Total	363.0 h		100.0 %	T-Depth(m)/T-Drilling Days				20.00	m/Day			
Casing				T-Depth(m)/T-Drilling Shifts				20.00	m/Shift			
Casing Depth and Size	Casing Ratio	Casing Pipe Recovery		T-Depth(m)/True-Drilling Days				20.83	m/Day			
(m)	(%)	(m)	(%)	T-Depth(m)/True-Drilling Shifts				20.83	m/Shift			
86 mm 18.50 m	3.7	15.00	81.1	T-Depth(m)/T-Workers				3.13	m/Worker			
0 mm 0.00 m	0.0	0.00		Actual Drilling Workers/T-Depth(m)				0.24	Worker/m			

Table II-1-7 Results of drilling (MJZS-8)

Class	Drilling Period				Specifications of Working Days							
	Working Period				Total Working Days		Day off		True Working Days			
	Starting Date ~ Finishing Date				Days	Shift	Days	Shift	Days	Shift	A-shift	*W
Preparation	97/06/18 ~ 97/06/19				2	2	0	0	2	2	0	10
Drilling	97/06/20 ~ 97/07/22				33	33	1	1	32	32	27	160
Withdraw	97/07/23 ~ 97/07/27				5	5	0	0	5	5	0	25
Total	97/06/18 ~ 97/07/27				40	40	1	1	39	39	27	195
Drilling Depth				Core Recovery par each 100m								
Planned Depth	650.00 m	Overburden		Depth	(m)	Core Length and Core Recovery		Cumulative Total				
Additional Depth	0.00 m	Core Length	648.60 m	0.00 ~ 17.70	16.30 m	92.09 %	92.09 %					
Total Depth	650.00 m	Recovery	99.78 %	17.70 ~ 112.20	94.50 m	100.00 %	98.75 %					
Working Time				112.20 ~ 229.20	117.00 m	100.00 %	99.39 %					
Drilling Time	208.0 h	61.2 %	53.6 %	229.20 ~ 319.20	90.00 m	100.00 %	99.56 %					
Trip, Core recover, Casing, Reaming, etc.,	32.0 h	15.3 %	13.4 %	319.20 ~ 412.20	93.00 m	100.00 %	99.66 %					
Fishing Job	40.0 h	11.8 %	10.3 %	412.20 ~ 499.20	87.00 m	100.00 %	99.72 %					
Water supply	0.0 h	0.0 %	0.0 %	499.20 ~ 650.00	150.80 m	100.00 %	99.78 %					
Others	40.0 h	11.8 %	10.3 %	Drilling Efficiency								
Sub-Total	340.0 h	100.0 %	87.6 %	T-Depth(m)/T-Working Days		16.25 m/Day						
Moved Out and In				T-Depth(m)/T-Working Shifts		16.25 m/Shift						
Rig Up	16.0 h		4.1 %	T-Depth(m)/True-Working Days		16.67 m/Day						
Tear Down	32.0 h		8.2 %	T-Depth(m)/True-Working Shifts		16.67 m/Shift						
Total	358.0 h		100.0 %	T-Depth(m)/T-Drilling Days		19.70 m/Day						
Casing				T-Depth(m)/T-Drilling Shifts		19.70 m/Shift						
Casing Depth and Size	Casing Ratio	Casing Pipe Recovery		T-Depth(m)/T-Workers		3.33 m/Worker						
(m)	(%)	(m)	(%)	Actual Drilling Workers/T-Depth(m)		0.21 Worker/m						
86 mm	17.70 m	2.7	15.60									
0 mm	0.00 m	0.0	0.00									

Table II-1-8 Results of drilling (MJZS-9)

Class	Drilling Period				Specifications of Working Days							
	Working Period				Total Working Days		Day off		True Working Days			
	Starting Date ~ Finishing Date				Days	Shift	Days	Shift	Days	Shift	A-shift	*W
Preparation	97/06/18 ~ 97/06/19				2	2	0	0	2	2	0	10
Drilling	97/06/20 ~ 97/07/07				18	18	1	1	17	17	15	85
Withdraw	97/07/08 ~ 97/07/09				2	2	0	0	2	2	0	10
Total	97/06/18 ~ 97/07/09				22	22	1	1	21	21	15	105
Drilling Depth				Core Recovery par each 100m								
Planned Depth	400.00 m	Overburden		Depth	(m)	Core Length and Core Recovery		Cumulative Total				
Additional Depth	0.00 m	Core Length	392.20 m	0.00 ~ 34.50	26.70 m	77.39 %	77.39 %					
Total Depth	400.00 m	Recovery	98.05 %	34.50 ~ 121.70	87.20 m	100.00 %	93.59 %					
Working Time				121.70 ~ 226.70	105.00 m	100.00 %	96.56 %					
Drilling Time	114.0 h	57.9 %	47.5 %	226.70 ~ 323.00	96.30 m	100.00 %	97.59 %					
Trip, Core recover, Casing, Reaming, etc.,	27.0 h	13.7 %	11.3 %	323.00 ~ 400.00	77.00 m	100.00 %	98.05 %					
Fishing Job	16.0 h	8.1 %	6.7 %	Drilling Efficiency								
Water supply	0.0 h	0.0 %	0.0 %	T-Depth(m)/T-Working Days		18.18 m/Day						
Others	40.0 h	20.3 %	16.7 %	T-Depth(m)/T-Working Shifts		18.18 m/Shift						
Sub-Total	197.0 h	100.0 %	82.1 %	T-Depth(m)/True-Working Days		19.05 m/Day						
Moved Out and In				T-Depth(m)/True-Working Shifts		19.05 m/Shift						
Rig Up	16.0 h		6.7 %	T-Depth(m)/T-Drilling Days		22.22 m/Day						
Tear Down	27.0 h		11.3 %	T-Depth(m)/T-Drilling Shifts		22.22 m/Shift						
Total	240.0 h		100.0 %	T-Depth(m)/True-Drilling Days		26.67 m/Day						
Casing				T-Depth(m)/True-Drilling Shifts		26.67 m/Shift						
Casing Depth and Size	Casing Ratio	Casing Pipe Recovery		T-Depth(m)/T-Workers		3.81 m/Worker						
(m)	(%)	(m)	(%)	Actual Drilling Workers/T-Depth(m)		0.19 Worker/m						
86 mm	20.50 m	5.1	17.60									
0 mm	0.00 m	0.0	0.00									

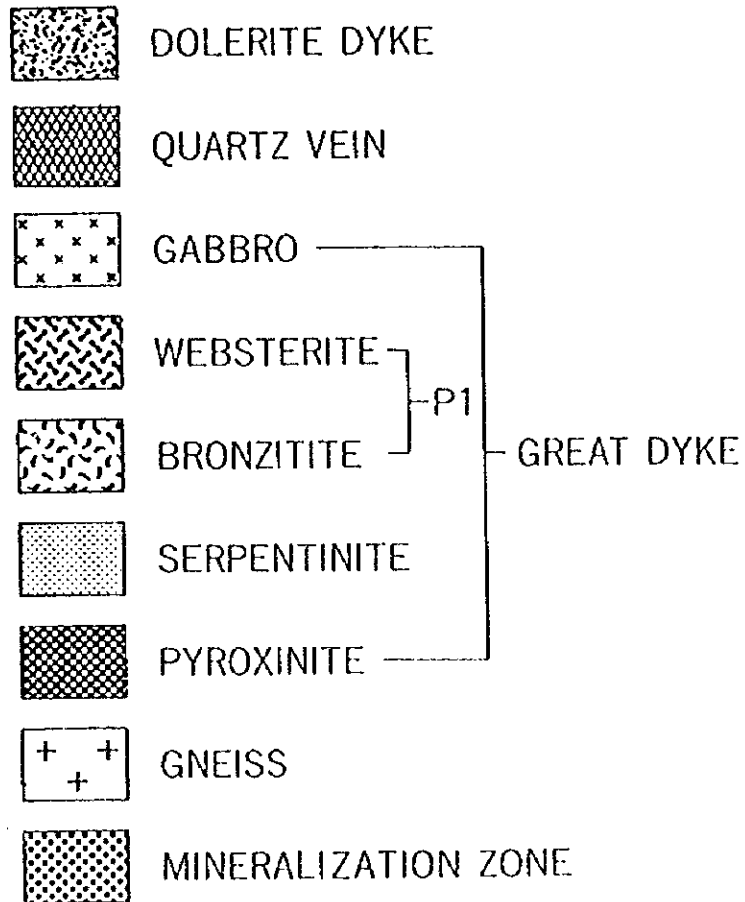
Table II-1-9 Results Of drilling (MJZS-10)

Drilling Period											
Class	Working Period			Specifications of Working Days							
	Starting Date ~ Finishing Date		Total Working Days		Day off		True Working Days		%		
	Days	Shift	Days	Shift	Days	Shift	Days	Shift		%	
Preparation	97/07/27	~	97/08/01	6	6	0	0	6	6	0	30
Drilling	97/08/02	~	97/08/12	11	11	0	0	11	11	11	55
Withdraw	97/08/13	~	97/08/20	8	8	0	0	8	8	0	40
Total	97/07/27	~	97/08/20	25	25	0	0	25	25	11	125
Drilling Depth				Core Recovery per each 100m							
Planned Depth	400.00 m	Overburden		Depth (m)	Core Length and Core Recovery		Cumulative Total				
Additional Depth	0.00 m	Core Length	390.90 m	0.00 ~ 29.10	20.00 m	68.73 %	68.73 %				
Total Depth	400.00 m	Recovery	97.73 %	29.10 ~ 118.60	89.50 m	100.00 %	92.33 %				
				118.60 ~ 211.60	93.00 m	100.00 %	95.70 %				
				211.60 ~ 292.60	81.00 m	100.00 %	96.89 %				
				292.60 ~ 400.00	107.40 m	100.00 %	97.73 %				
Working Time				Drilling Efficiency							
Drilling Time	88.0 h	54.0 %	41.7 %	T-Depth(m)/T-Working Days	16.00	m/Day					
Trip, Core recover, Casing, Reaming, etc.,	24.0 h	14.7 %	11.4 %	T-Depth(m)/T-Working Shifts	16.00	m/Shift					
Fishing Job	0.0 h	0.0 %	0.0 %	T-Depth(m)/True-Working Days	16.00	m/Day					
Water supply	11.0 h	6.7 %	5.2 %	T-Depth(m)/True-Working Shifts	16.00	m/Shift					
Others	40.0 h	24.5 %	19.0 %	T-Depth(m)/T-Drilling Days	36.36	m/Day					
Sub-Total	163.0 h	100.0 %	77.3 %	T-Depth(m)/T-Drilling Shifts	36.36	m/Shift					
Noted Out and In				T-Depth(m)/True-Drilling Days	36.36	m/Day					
Rig Up	16.0 h		7.6 %	T-Depth(m)/True-Drilling Shifts	36.36	m/Shift					
Tear Down	32.0 h		15.2 %	T-Depth(m)/T-Workers	3.20	m/Worker					
Total	211.0 h		100.0 %	Actual Drilling Workers/T-Depth(m)	0.14	Worker/m					
Casing		Casing Pipe Recovery									
Casing Depth and Size	Casing Ratio	Casing Pipe Recovery									
(m)	(%)	(m)	(%)								
86 mm 29.00 m	7.3	26.00	89.7								
0 mm 0.00 m	0.0	0.00									



A-4 Drilling columns

Index





MJZS-6-(1)

0m-100m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	No.	SAMPLE			CHEMICAL ANALYSIS							
							FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Er (ppb)	S (%)		
0.00		Red soil	Weathered zone gabbro block bearing														
6.93		White soil	White clay and gabbro block														
10.00																	
16.69		Gabbro	16.69m- Light green, soft, medium grain, equigranular, holocrystalline, plagioclase >> clinopyroxene > orthopyroxene weak whetted														
20.00																	
30.00																	
35.27			35.27m- Green to deep green hard, compact, medium-coarse grain, equigranular, holocrystalline, plagioclase many >> pyroxene spotted pattern														
40.00																	
50.00																	
60.00			58.00m-61.00m Fault zone strongly fractured, silicified.														
64.96			64.96m-68.90m Fault zone yellow to yellow green clay 200 ~ 70														
70.00																	
75.00			75.00m-76.60m Fault? green to white clay														
80.00																	
90.00																	
100.00																	

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-2 Drilling column (MJZS-6) (1)

MJZS-6-(2)

100m-200m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	AFTR	SAMPLE			CHEMICAL ANALYSIS							
						No.	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)	
110.00	[Dotted pattern]	Gabbro	Green to deep green, medium grain, equigranular, holocrystalline texture, plagioclase>clinopyroxene> orthopyroxene,													
120.00																
130.00																
140.00																
150.00																
156.10	[Cross-hatched pattern]	Websterite	156.10m-- Green and purple spot, rather fine grain, clinopyroxene and orthopyroxene													
160.00																
170.00			170.20m-- *Weak calcite and chlorite veinlet.													
180.00																
190.00			191.40m-- Calcite vein and network 195.30m-- Calcite chlorite vein W=5cm, Z 70' 197.00m-- Olive green, metamorphosed													
200.00																

Sample (O.A.-Ore Analysis ; TS- Thin Section ; PS- Polish Section ; R- Rock)

Fig.II-1-2 Drilling column (MJZS-6) (2)

MJZS-6-(3)

200m-300m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS								
						No	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	RA (ppb)	S (%)		
200.70			200.70m--210.94m Fault and fractured zone, white silicified boundary $\angle 70^\circ \sim 80^\circ$														
210.00																	
210.94			210.94m-- Olive green, metamorphosed zone, partly fractured small chlorite vein many.														
220.00																	
230.00																	
240.00																	
250.00																	
260.00																	
263.50			263.50m--268.00m Fractured and fault zone, silicified and chlorite rich														
268.00			Weak sulphide dissemination														
270.00																	
275.00			275.00m--281.50m Fault zone banding and silicified														
280.00																	
281.50																	
285.00		Bronzitic	Gradually changed to Bronzite green to deep green, coarse grain, holocrystalline, equigranular, almost all orthopyroxene.														
290.00																	
296.00				296.00m-- Fault zone ? banding and fractured													
300.00																	

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-2 Drilling column (MJZS-6) (3)

MJZS-6-(4)

300m-400m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN ALTER.	SAMPLE				CHEMICAL ANALYSIS									
					No.	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)				
307.50	[Pattern]	Bronzite	Green to deep green color, coarse-medium grain, orthopyroxene >> clinopyroxene,															
310.00		Serpentinite	Gray, fine grain, soapy, banded serpentine, olivin and weak pyroxene															
315.00			315.00m-- Black, compact,															
316.84 318.30 320.00			316.84m--318.30m Chromitite 318.30m-- White to black, soapy banding and mottled color,															
322.80	[Pattern]	Bronzite	322.80m-- Gray and green, mainly orthopyroxene and weak clinopyroxene 323m--340m sulphide disseminate															
330.00					TS- 4	334.50												
						OA 1	327.00	328.00	1.00	3	2.94	< 10	39	< 10	0.09			
						OA 2	328.00	329.00	1.00	14	0.46	< 10	57	< 10	0.13			
						OA 3	329.00	330.00	1.00	34	4.41	< 10	< 10	< 10	0.15			
						OA 4	330.00	331.00	1.00	17	1.65	< 10	< 10	< 10	0.12			
						OA 5	331.00	332.00	1.00	18	1.08	< 10	< 10	< 10	0.10			
						OA 6	332.00	333.00	1.00	42	1.29	21	< 10	< 10	0.12			
						OA 7	333.00	334.00	1.00	43	2.36	67	< 10	< 10	0.12			
						OA 8	334.00	335.00	1.00	45	1.56	44	< 10	< 10	0.25			
						OA 9	335.00	336.00	1.00	82	2.63	76	< 10	< 10	0.23			
						OA 10	336.00	337.00	1.00	86	3.16	100	< 10	< 10	0.21			
						OA 11	337.00	338.00	1.00	112	1.50	272	34	< 10	0.15			
						OA 12	338.00	339.00	1.00	146	0.49	534	79	< 10	0.15			
						OA 13	339.00	340.00	1.00	152	3.41	541	145	15	0.13			
						OA 14	340.00	341.00	1.00	91	0.43	479	98	19	0.11			
						OA 15	341.00	342.00	1.00	72	0.44	511	154	27	0.11			
						OA 16	342.00	343.00	1.00	34	0.16	409	262	18	0.08			
						OA 17	343.00	344.00	1.00	10	0.11	136	136	< 10	0.05			
						OA 18	344.00	345.00	1.00	11	0.21	120	103	< 10	0.04			
					OA 19	345.00	346.00	1.00	16	3.37	87	127	< 10	0.05				
					OA 20	346.00	347.00	1.00	11	0.68	41	133	< 10	0.04				
					OA 21	347.00	348.00	1.00	33	0.11	13	108	< 10	0.04				
					PS- 6	338.50												
					PS- 7	339.50												
					PS- 8	341.50												
					PS- 9	342.50												
371.34	[Pattern]	Dunite	371.34m--374.00m Black and white, fine grain, banding,															
374.00		Bronzite	374.00m-- Gray, coarse grain, weak olivin bearing,															
392.00	[Pattern]		392.00m--395.50m Pale green to white, chlorite and serpentine many, ZW ±															
395.50																		

Sample (OA: Ore Analysis ; TS: Thin Section ; PS: Polish Section ; R: Rock)

Fig.II-1-2 Drilling column (MJZS-6) (4)

MJZS-6-(5)

400m-500m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VES.	ALTER.	SAMPLE				CHEMICAL ANALYSIS							
						No.	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rb (ppb)	S (%)		
		Bronzite															
404.00		Serpentine	404.00m- White to gray, soapy soft, white and gray banding, mainly serpentine and olivin.														
410.00																	
420.00																	
423.00		Dunite	423.00m-426.30m Black and soft, mottled pattern, mainly olivin.														
426.30		Serpentine	426.30m- White and black, banding, soft, soapy.														
430.00																	
436.00		Bronzite	436.00m- Deep green, coarse grain, almost all orthopyroxene, holocrystalline, equigranular.														
440.00																	
450.00			450.00m STOP														
460.00																	
470.00																	
480.00																	
490.00																	
500.00																	

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-2 Drilling column (MJZS-6) (5)

MJZS-7-(1)

0m-100m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS							
						No	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Bi (ppb)	S (%)	
		Red soil	Weathered zone													
3.00		Green soil														
9.00 10.00		Gabbro	Gabbro block and green clay weathered and crushed zone													
18.00 20.00		Gabbro	18.00m-- Green to deep green medium grain, equigranular, holocrystalline, hard, compact, plagioclase >> clinopyroxene > orthopyroxene white spot (plagioclase) many													
30.00																
40.00																
50.00																
60.00																
70.00																
80.00																
90.00																
91.36			91.36m Calcite vein W=5cm Z60													
100.00																

Sample (OA., Ore Analysis ; TS., Thin Section ; PS., Polish Section ; R., Rock)

Fig. II-1-3 Drilling column (MJZS-7) (1)

MJZS-7-(2)

100m-200m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER.	SAMPLE			CHEMICAL ANALYSIS										
						No.	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)				
110.00		Gabbro	Green to deep green, medium grain, equigranular, holocrystalline texture, plagioclase>clinopyroxene> orthopyroxene,																
120.00			Gradually clinopyroxene become many																
130.00			133.60m Chlorite vein,																
140.00																			
150.00																			
160.00																			
170.00																			
180.00																			
190.00																			
200.00																			

Sample (QA: Ore Analysis ; TS: Thin Section ; PS: Polish Section ; R: Rock)

Fig.II-1-3 Drilling column (MJZS-7) (2)

MJZS-7-(3)

200m-300m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS							
						No.	FROM (m)	TO (m)	L. (m)	As (ppb)	Ag (ppm)	Pb (ppb)	Pd (ppb)	Rh (ppb)	S (%)	
210.00	[Dotted pattern]															
220.00																
223.70	[Stippled pattern]	Serpentinite	223.70m--233.00m Deep green to olive green, white and black banding, fine grain, weak olivine bearing.													
230.00																
233.00	[Cross-hatched pattern]	Websterite	233.00m-- Green color and purple spot of clinopyroxene medium grain, holocrystalline, orthopyroxene=clinopyroxene													
240.00																
250.00	[Cross-hatched pattern]															
260.00																
267.50	[Cross-hatched pattern]		267.50m--270.50m Calcite and chlorite vein many.													
270.00																
280.00	[Cross-hatched pattern]															
290.00																
300.00	[Cross-hatched pattern]															

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-3 Drilling column (MJZS-7) (3)

MJZS-7-(4)

300m-400m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEINS	AIR	SAMPLE			CHEMICAL ANALYSIS								
						No.	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pb (ppb)	Cd (ppb)	Kh (ppb)	S (%)		
310.00	[Cross-hatched pattern]	Websterite															
320.00																	
330.00																	
340.00	[Dotted pattern]	Bronzite	340.38m-- Green to deep green medium to coarse grain, almost all orthopyroxene, weak clinopyroxene remain.														
350.00			355.00m-- Gradually changed to almost all orthopyroxene and with no clinopyroxene. 358.00m-- Calcite vein bearing														
360.00			367.00m-- Pale green, rather coarse grain, calcite vein many weak sulphide dissemination along to calcite vein.														
370.00																	
375.00	[Stippled pattern]	Serpentinite	377.00m-- Gradually changed to serpentinite, dark green to olive green, mottled pattern, serpentine, olivin and weak orthopyroxene recognized, many calcite veinlet bearing.														
380.00																	
390.00																	
400.00	[Cross-hatched pattern]		395.00m-- Py, Po, Cp dissemination and lim vein with calcite vein.														

Sample (QA: Ore Analysis ; PS: Thin Section ; PS: Polish Section ; R: Rock)

Fig. II-1-3 Drilling column (MJZS-7) (4)

MJZS-7-(5)

400m-500m

DEPTH (m)	GEOLOGIC COLLARS	ROCK NAME	DESCRIPTION	VES	ALTER	SAMPLE			CHEMICAL ANALYSIS															
						No	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pb (ppb)	Cd (ppb)	Rb (ppb)	S (%)									
410.00	[Patterned]	Serpentine	Weak sulphide mineralization continue, 415.00m-- Sulphide mineralization become a little strong, many fracture and calcite vein recognized.																					
420.00																								
430.00																								
440.00																								
450.00						440.00m-- strongly crushed.																		
460.00				[Patterned]	Bronzite	450.00m-- Gradually changed to bronzite, deep green, coarse grain, almost all orthopyroxene, holocrystalline, equigranular, sulphide mineralization become strong. 475.00m-- sulphide mineralization finished.																		
470.00																								
480.00																								
490.00																								
500.00									500.00m STOP															
												TS- 1	448.50											
												TS- 2	462.50											
												TS- 3	464.50											
									PS- 1	468.50														
									PS- 2	469.50														
									PS- 3	470.50														
									PS- 4	471.50														
									PS- 5	472.50														
									OA- 1	443.00	441.00	1.00	17	1.25	< 10	138	< 10	0.18						
									OA- 2	444.00	445.00	1.00	16	1.25	< 10	170	< 10	0.19						
									OA- 3	445.00	446.00	1.00	18	1.31	< 10	225	< 10	0.18						
									OA- 4	446.00	447.00	1.00	11	1.16	< 10	208	< 10	0.20						
									OA- 5	447.00	448.00	1.00	17	1.18	< 10	172	< 10	0.25						
									OA- 6	448.00	449.00	1.00	25	0.95	< 10	190	< 10	0.27						
									OA- 7	449.00	450.00	1.00	12	1.01	< 10	190	< 10	0.21						
									OA- 8	450.00	451.00	1.00	15	1.30	< 10	149	< 10	0.19						
									OA- 9	451.00	452.00	1.00	16	0.61	< 10	318	< 10	0.21						
									OA- 10	452.00	453.00	1.00	16	0.70	< 10	151	< 10	0.21						
									OA- 11	453.00	454.00	1.00	15	0.78	< 10	85	< 10	0.20						
									OA- 12	454.00	455.00	1.00	21	0.72	< 10	35	< 10	0.21						
									OA- 13	455.00	456.00	1.00	17	0.83	< 10	124	< 10	0.21						
									OA- 14	456.00	457.00	1.00	19	0.81	< 10	236	< 10	0.19						
						OA- 15	457.00	458.00	1.00	22	1.51	< 10	115	< 10	0.20									
						OA- 16	458.00	459.00	1.00	30	0.88	< 10	168	< 10	0.23									
						OA- 17	459.00	460.00	1.00	29	0.74	< 10	207	< 10	0.20									
						OA- 18	460.00	461.00	1.00	38	0.89	< 10	153	< 10	0.21									
						OA- 19	461.00	462.00	1.00	43	0.90	< 10	88	< 10	0.17									
						OA- 20	462.00	463.00	1.00	48	1.11	< 10	158	< 10	0.27									
						OA- 21	463.00	464.00	1.00	31	0.41	< 10	61	< 10	0.13									
						OA- 22	464.00	465.00	1.00	68	0.74	< 10	150	< 10	0.21									
						OA- 23	465.00	466.00	1.00	72	0.51	< 10	101	< 10	0.21									
						OA- 24	466.00	467.00	1.00	75	0.45	< 10	239	< 10	0.20									
						OA- 25	467.00	468.00	1.00	100	0.70	< 10	171	< 10	0.25									
						OA- 26	468.00	469.00	1.00	104	0.58	< 10	339	< 10	0.27									
						OA- 27	469.00	470.00	1.00	130	0.72	< 10	513	< 10	0.21									
						OA- 28	470.00	471.00	1.00	106	1.56	< 10	436	< 10	0.19									
						OA- 29	471.00	472.00	1.00	59	0.76	< 10	276	< 10	0.18									
						OA- 30	472.00	473.00	1.00	28	0.56	< 10	306	< 10	0.10									
						OA- 31	473.00	474.00	1.00	18	1.40	< 10	276	< 10	0.07									
						OA- 32	474.00	475.00	1.00	20	0.13	< 10	76	< 10	0.06									
						OA- 33	475.00	476.00	1.00	24	0.06	< 10	79	< 10	0.06									
						OA- 34	476.00	477.00	1.00	17	0.06	< 10	74	< 10	0.06									
						OA- 35	477.00	478.00	1.00	16	0.06	< 10	62	< 10	0.06									
						OA- 36	478.00	479.00	1.00	15	0.10	< 10	77	< 10	0.06									
						OA- 37	479.00	480.00	1.00	8	0.21	< 10	56	< 10	0.06									
						OA- 38	480.00	481.00	1.00	7	0.06	< 10	51	< 10	0.06									
						OA- 39	481.00	482.00	1.00	4	0.11	< 10	35	< 10	0.04									
						OA- 40	482.00	483.00	1.00	4	0.06	< 10	67	< 10	0.09									
						OA- 41	483.00	484.00	1.00	3	0.33	< 10	53	< 10	0.06									
						OA- 42	484.00	485.00	1.00	4	0.18	< 10	27	< 10	0.04									

Sample (OA: Ore Analysis ; TS: Thin Section ; PS: Polish Section ; R: Rock)

Fig.II-1-3 Drilling column (MJZS-7) (5)

MJZS-8-(1)

0m-100m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS										
						No	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)				
0.00	[Soil pattern]	Soil	Red to pale green, weathered zone																
12.50		[Gabbro pattern]	Gabbro	12.50m-- Pale green, hard, medium grain, equigranular, holocrystalline, hard, compact, plagioclase >> clinopyroxene > orthopyroxene white spot (plagioclase) many															
41.20m--46.30m			crushed zone																
100.00																			

Sample (OA-Ore Analysis ; IS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-4 Drilling column (MJZS-8) (1)

MJZS-8-(2)

100m-200m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VENS	ALTER	SAMPLE			CHEMICAL ANALYSIS								
						No	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pb (ppb)	RA (ppb)	S (%)		
110.00	[Dotted pattern]	Gabbro	Green to deep green, medium grain, equigranular, holocrystalline texture, plagioclase>clinopyroxene> orthopyroxene.														
120.00																	
130.00																	
140.00																	
150.00																	
160.00																	
170.00																	
180.00				[Crushed zone pattern]		172.00m--179.00m crushed zone											
190.00				[Crushed zone pattern]		183.00m--184.00m crushed zone											
200.00				[Dotted pattern]													

Sample (OA-Ore Analysis ; IS- Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-4 Drilling column (MJZS-8) (2)

MJZS-8-(3)

200m-300m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS											
						No.	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pb (ppb)	Ka (ppb)	S (%)					
210.00		Gabbro	223.00m--236.00m Weak chlorite vein many																	
220.00																				
230.00																				
240.00						240.00m--247.00m Calcite, chlorite veinlet many														
250.00																				
260.00																				
270.00																				
280.00																				
290.00																				
300.00																				

Sample (OA, Ore Analysis ; TS, Thin Section ; PS, Polish Section ; R, Rock)

Fig.II-1-4 Drilling column (MJZS-8) (3)

MJZS-8-(4)

300m-400m

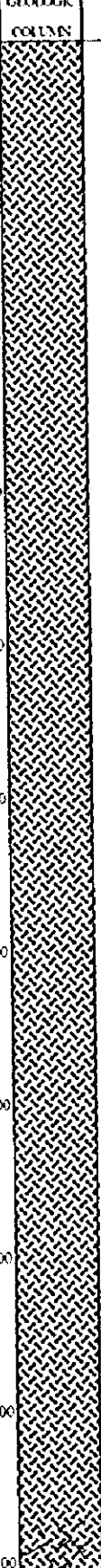
DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME (abbv)	DESCRIPTION	VEN	ALTER	SAMPLE			CHEMICAL ANALYSIS										
						No.	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Kh (ppb)	S (%)				
310.00																			
320.00																			
330.00																			
340.00																			
350.00																			
350.00																			
370.00																			
380.00																			
390.00																			
400.00																			

Sample (OA: Ore Analysis ; TS: Thin Section ; PS: Polish Section ; R: Rock)

Fig.II-1-4 Drilling column (MJZS-8) (4)

MJZS-8-(5)

400m-500m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	OTHER	SAMPLE			CHEMICAL ANALYSIS										
						No.	FROM (m)	TO (m)	L (m)	As (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)				
410.00		Websterite																	
420.00																			
430.00																			
440.00																			
450.00																			
460.00					457.00m-- Very weak sulphide dissemination														
470.00																			
480.00																			
490.00																			
500.00					497.70m-- Fractured and chlorite vein and network														

Sample (OA: Ore Analysis ; TS: Thin Section ; PS: Polish Section ; R: Rock)

Fig.II-1-4 Drilling column (MJZS-8) (5)

MJZS-8-(6)

500m-600m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS										
						No.	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)				
510.00	[Patterned]	Websterite																	
520.00																			
527.60 530.00		Bronzite	527.60m-- Green to deep green coarse grain, mainly orthopyroxene, very weak clinopyroxene bearing																
540.00	[Patterned]																		
550.00			554.00m--562.00m Very weak Cp, Po, Py dissemination																
560.00			564.19m--565.50m small calcite vein many																
570.00																			
574.19		Serpentine	574.19m-- Dark gray, fine grain Olivin bearing, Serpentine ?																
580.00 581.30		Bronzite	581.30m-- Green to deep green coarse grain, mainly orthopyroxene. 584.00m--589.00m Very weak Py, Po, Cp dissemination																
590.00			589.00m-- Mineralization become a little strong																
600.00																			

OA 1	526.00	567.00	1.00	<	1	0.16	<	10	<	10	<	10	0.17
OA 2	567.00	566.00	1.00		5	0.23	<	10	<	10	<	10	0.17
OA 3	568.00	569.00	1.00	<	1	0.16	<	10	<	10	<	10	0.17
OA 4	569.00	569.00	1.00		7	0.21	<	10	<	10	<	10	0.17
OA 5	569.00	564.00	1.00	<	1	0.13	<	10	<	10	<	10	0.16
OA 6	561.00	562.00	1.00		3	0.63	<	10	<	10	<	10	0.18
OA 7	562.00	563.00	1.00	<	1	0.20	<	10	<	10	<	10	0.17
OA 8	563.00	564.00	1.00		1	0.13	<	10	<	10	<	10	0.16

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-4 Drilling column (MJZS-8) (6)

MJZS-8-(7)

600m-700m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	DIP	SAMPLE			CHEMICAL ANALYSIS											
						No	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Cu (ppb)	S (%)					
610.00		Bronzite	Sulphide mineralization continue rather Py, Po, Cp strong.			TS- 5	614.50													
					PS- 10	616.50														
									PS- 11	617.50										
									PS- 12	618.50										
									OA 9	610.00	611.00	1.00	70	0.40	< 10	20	< 10	0.23		
									OA 10	611.00	612.00	1.00	82	0.33	< 10	13	< 10	0.23		
									OA 11	612.00	613.00	1.00	42	0.20	< 10	11	< 10	0.16		
									OA 12	613.00	614.00	1.00	76	0.23	36	27	< 10	0.19		
									OA 13	614.00	615.00	1.00	162	0.36	230	113	< 10	0.27		
									OA 14	615.00	616.00	1.00	139	0.30	230	121	< 10	0.23		
									OA 15	616.00	617.00	1.00	144	0.31	423	301	10	0.21		
620.00									OA 16	617.00	618.00	1.00	139	0.43	392	264	26	0.18		
									OA 17	618.00	619.00	1.00	119	0.31	274	332	37	0.16		
									OA 18	619.00	620.00	1.00	49	0.23	206	317	36	0.11		
									OA 19	620.00	621.00	1.00	28	1.37	130	289	18	0.07		
									OA 20	621.00	622.00	1.00	18	0.57	86	262	25	0.06		
									OA 21	622.00	623.00	1.00	9	0.15	68	150	< 10	0.06		
									OA 22	623.00	624.00	1.00	9	0.13	65	116	< 10	0.06		
									OA 23	624.00	625.00	1.00	10	0.26	73	252	11	0.06		
									OA 24	625.00	626.00	1.00	13	0.17	65	231	< 10	0.06		
						626.00m Mineralization finish														
630.00																				
640.00																				
650.00			650.00m STOP																	
660.00																				
670.00																				
680.00																				
690.00																				
700.00																				

Sample (OA: Ore Analysis ; TS: Thin Section ; PS: Polish Section ; R: Rock)

Fig.II-1-4 Drilling column (MJZS-8) (7)

MJZS-9-(1)

0m-100m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VES	ALTER	SAMPLE		CHEMICAL ANALYSIS									
						No	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Kh (ppb)	S (%)		
0.00		Soil	Green to pale green soil and gabbro block														
8.00		Gabbro	8.00m-- Green to pale green fresh and hard														
10.00																	
20.00																	
22.70			22.70m--25.00m Pale green, weathered, coarse grain, plagioclase many														
25.00																	
30.00			25.00m-- Deep green, hard, fine grain, equigranular, holocrystalline, compact plagioclase>>clinopyroxene>orthopyroxene white spot (plagioclase) many														
40.00																	
50.00																	
52.74			50.0m--52.74m Weak chlorite veinlet many														
60.00																	
70.00																	
80.00																	
90.00																	
100.00																	

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-5 Drilling column (MJZS-9) (1)

MJZS-9-(2)

100m-200m

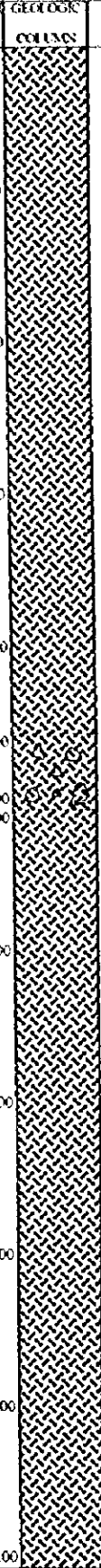
DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VES	ALTER	SAMPLE			CHEMICAL ANALYSIS						
						No.	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)
		Gabbro	Green to deep green, plagioclase>clinopyroxene> orthopyroxene,												
107.00			107.00m-- Weak calcite veinlet bearing												
110.00															
120.00															
130.00															
137.50			137.50m-- Weak calcite veinlet												
140.00															
150.00															
157.00			157.00m--169.00m Chlorite veinlet many												
160.00															
169.00															
170.00															
180.00															
190.00		Websterite	190.50m-- Green and purple spot, clinopyroxene many and orthopyroxene, medium grain, holocrystalline, equigranular,												
190.50															
200.00															

Sample (CA, Ore Analysis ; IS, Thin Section ; PS, Polish Section ; R, Rock)

Fig.II-1-5 Drilling column (MJZS-9) (2)

MJZS-9-(3)

200m-300m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN/ALTER		SAMPLE			CHEMICAL ANALYSIS											
				No	FROM (m)	TO (m)	L. (m)	Au (ppb)	Ag (ppm)	Pb (ppb)	Pd (ppb)	Rh (ppb)	S (%)							
210.00		Websterite																		
220.00																				
230.00																				
240.00																				
246.00					246.00m-251.00m Weak fractured zone															
250.00																				
251.00																				
260.00																				
270.00																				
280.00																				
290.00																				
300.00																				

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-5 Drilling column (MJZS-9) (3)

MJZS-9-(4)

300m-400m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS												
						No.	FROM (m)	TO (m)	T. (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)						
310.00		Websterite																			
328.54		Bronzite	328.54m-- Deep green, almost all orthopyroxene, many small calcite bearing, and weak Py, Po, Cp disseminate both side of calcite vein, very weak olivine and sphene ? bearing.			OA 1	328.00	329.00	1.00	<	1	0.45	<	10	79	<	10	0.11			
330.00						OA 2	328.00	330.00	1.00	<	1	0.43	<	10	168	<	10	<	10	0.12	
						OA 3	330.00	331.00	1.00	<	1	1.06	<	10	110	<	10	<	10	0.11	
						OA 4	331.00	332.00	1.00	<	2	0.17	<	10	11	<	10	<	10	0.06	
						OA 5	332.00	333.00	1.00	<	1	0.13	<	10	49	11	<	10	<	10	0.06
						OA 6	333.00	334.00	1.00	<	1	0.32	<	10	<	10	<	10	<	10	0.10
						OA 7	334.00	335.00	1.00	<	21	2.96	<	10	<	10	<	10	<	10	0.10
						OA 8	335.00	336.00	1.00	<	7	2.27	<	10	<	10	<	10	<	10	0.09
						OA 9	336.00	337.00	1.00	<	1	0.50	<	10	<	10	<	10	<	10	0.08
340.00								OA 10	337.00	338.00	1.00	<	1	0.22	<	10	<	10	<	10	0.08
								OA 11	338.00	339.00	1.00	<	3	0.17	<	10	<	10	<	10	0.06
342.90						342.90m--348.95m Clinopyroxene bearing.		OA 12	339.00	340.00	1.00	<	1	0.17	<	10	<	10	<	10	0.08
								OA 13	340.00	341.00	1.00	<	1	0.13	<	10	<	10	<	10	0.06
								OA 14	341.00	342.00	1.00	<	1	0.13	<	10	<	10	<	10	0.06
							OA 15	342.00	343.00	1.00	<	1	2.75	<	10	<	10	<	10	0.10	
348.90			348.95m-- Calcite veinlet many																		
350.00																					
354.85			354.85m--372.27m Clinopyroxene bearing																		
360.00																					
370.00																					
372.27			372.27m--379.97m Chlorite and calcite veinlet many.																		
379.97			379.97m-- Clinopyroxene many																		
380.00																					
390.00																					
394.50			394.50m--397.20m Almost all orthopyroxene. 396.00m--399.00m Weak Py disseminate																		
						OA 16	396.00	397.00	1.00	<	1	0.82	<	10	<	10	<	10	0.08		
						OA 17	397.00	398.00	1.00	<	4	0.21	<	10	<	10	<	10	0.09		
						OA 18	398.00	399.00	1.00	<	1	0.44	<	10	<	10	<	10	0.09		
400.00			400.00m STOP																		

Sample (OA., Ore Analysis ; IS., Thin Section ; PS., Polish Section ; R., Rock)

Fig.II-1-5 Drilling column (MJZS-9) (4)

MJZS-10-(1)

0m-100m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	SYN	ALTER	SAMPLE			CHEMICAL ANALYSIS						
						No.	FROM (m)	TO (m)	L (m)	Aa (ppb)	Ag (ppm)	Pt (ppb)	Pb (ppb)	Kb (ppb)	S (%)
		Gabbro	Block and weathered												
3.00		Soil	White soil and clay												
6.89		Gabbro	6.89m-9.89m Gabbro block												
9.89		Sand	Weathered zone												
10.00															
20.00															
24.89		Gabbro	24.89m- Gray, weathered part along to fracture, small vein of calcite and chlorite, coarse grain												
30.00															
40.00															
50.00			50.0m- Green to deep green, medium grain, plagioclase rich and orthopyroxene, holocrystalline equigranular, fresh.												
60.00															
65.00			65.00m- Weak clinopyroxene mixing.												
70.00															
80.00															
90.00															
100.00															

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-6 Drilling column (MJZS-10) (1)

MJZS-10-(2)

100m-200m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE			CHEMICAL ANALYSIS										
						No	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)				
110.00 111.00		Gabbro	111.00m-- Almost all plagioclase and orthopyroxene																
120.00																			
130.00																			
140.00																			
145.00 148.00			135.00m--148.00m Fault ? and small calcite vein																
150.00			148.00m-- Small calcite vein many																
156.50 157.00			156.50m--157.00m Fractured zone, fault ?																
160.00																			
170.00																			
180.00																			
184.00 187.00			184.00m--187.00m Fractured quartz and calcite veins																
187.00																			
196.50 200.00		Websterite	196.50m-- Green and purple spot, clinopyroxene many and orthopyroxene, medium grain, holocrystalline, equigranular,																
200.00																			

Sample (OA-Ore Analysis ; IS-Thin Section ; PS-Polish Section ; R-Rock)

Fig.II-1-6 Drilling column (MJZS-10) (2)

MJZS-10-(3)

200m-300m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	CYN	D. ITR	SAMPLE			CHEMICAL ANALYSIS												
						No.	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppm)	Pt (ppb)	Pd (ppb)	Bi (ppb)	S (%)						
204.00		Websterite	204.00m--208.00m																		
208.00			Weak fractured zone																		
210.00		Websterite																			
220.00																					
230.00																					
231.00		Websterite	231.00m--237.00m																		
237.00			Fault zone? quartz vein (w=5cm), chlorite, epidote?, serpentine? many, deep green to olive green																		
240.00		Websterite																			
250.00																					
260.00																					
270.00																					
280.00																					
290.00																					
300.00																					

Sample (OA-Ore Analysis ; TS-Thin Section ; PS-Polish Section ; R-Rock)

Fig. II-1-6 Drilling column (MJZS-10) (3)

MJZS-10-(4)

300m-400m

DEPTH (m)	GEOLOGIC COLUMN	ROCK NAME	DESCRIPTION	VEIN	ALTER	SAMPLE		CHEMICAL ANALYSIS												
						No	FROM (m)	TO (m)	L (m)	Au (ppb)	Ag (ppb)	Pt (ppb)	Pd (ppb)	Rh (ppb)	S (%)					
301.50		Websterite Bronzite	301.40m-- Deep green, coarse grain $\phi=1\sim 5$ mm, almost all orthopyroxene, a small amount of oliv bearing ? weak Cp, Po, Py disseminate																	
310.00																				
320.00																				
323.00					323.00m-- Gradually change to almost all of orthopyroxene, coarse to medium grain.															
328.00					328.00m-- Rather strong sulphide dissemination.															
330.00																				
340.00																				
350.00																				
351.50					351.50m--355.50m Fractured zone, silicified, fault ?															
355.50						355.50m-- Fine and medium grain, clinopyroxene bearing.														
360.00																				
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390.00																				
400.00			400.00m STOP																	

Sample (OA: Ore Analysis ; TS: Thin Section ; PS: Polish Section ; R: Rock)

Fig.II-1-6 Drilling column (MJZS-10) (4)



1

2

3

4



JICA