

ARIS SUMMARY SHEET

District Geologist, Nelson

Off Confidential: 90.12.11

ASSESSMENT REPORT 19809

MINING DIVISION: Fort Steele

PROPERTY: Fors  
LOCATION: LAT 49 21 00 LONG 115 55 00  
UTM 11 5466710 578682  
NTS 082G05W

CAMP: 001 Purcell Belt (Sullivan)

CLAIM(S): Puma, Puma 1-3, Cougar 1-3

OPERATOR(S): Placer Dome

AUTHOR(S): Maheux, P.J.

REPORT YEAR: 1990, 45 Pages

COMMODITIES

SEARCHED FOR: Lead, Zinc, Silver

KEYWORDS: Proterozoic, Purcell Supergroup, Aldridge Formation, Quartz arenites  
Siltstones, Quartzites, Pyrite, Pyrrhotite, Galena, Sphalerite  
Chalcopyrite

WORK

DONE: Geological, Geochemical  
GEOL 2725.0 ha  
Map(s) - 2; Scale(s) - 1:10 000, 1:200  
ROCK 110 sample(s) ; CU, PB, ZN, AU, AG, AS  
Map(s) - 1; Scale(s) - 1:10 000  
SILT 115 sample(s) ; CU, PB, ZN, AU, AG, AS  
Map(s) - 1; Scale(s) - 1:10 000  
SOIL 751 sample(s) ; CU, PB, ZN, AU, AG, AS  
Map(s) - 24; Scale(s) - 1:2500

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FILMED

**GEOLOGY AND GEOCHEMISTRY REPORT**

**on the**

**FORS PROPERTY**

PUMA and COUGAR CLAIMS

LOG NO:	0321	RD
ACTION:		
FILE NO:		

Fort Steele Mining Division  
N.T.S. 82G/5W

Latitude: 49°21'N      Longitude: 115°55'W

Owners: L.D. Morgan, J.E. Morgan, R.T. Banting, C.R. Kennedy

Operator: Placer Dome Inc.

**GEOLOGICAL BRANCH  
ASSESSMENT REPORT**

P.J. Maheux

**19,809**

March, 1990

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## 1.0 INTRODUCTION

Placer Dome Inc. conducted geological and geochemical surveys on the Fors property from May to July, 1989. The Fors property comprises the Puma, Puma 1 to 3 and Cougar 1 to 3 mineral claims.

The Fors Property is in the Moyie Range of the Purcell Mountains about 17 kilometres southwest of Cranbrook, British Columbia in the Fort Steele Mining Division. Exploration work in 1989 was of an early stage designed to investigate the potential for Sullivan-style sedimentary exhalative Pb-Zn-Ag mineralization in sedimentary rocks of the Proterozoic Middle Aldridge Formation.

This report addresses the results from the geologic mapping, prospecting and geochemical sampling on the Fors Property and is submitted in fulfillment of provincial assessment requirements.

## 2.0 SUMMARY

The property is underlain by the oldest rocks exposed in the Purcell anticlinorium which is within the Proterozoic Purcell Supergroup. The units are dominantly siliciclastic sedimentary rocks of the Lower and Middle Aldridge Formations. In the the southeast the right-lateral, reverse Moyie fault juxtaposes Aldridge rocks with a conformable package of younger Creston Formation siltstones and argillites. Creston strata conformably overlie carbonates and clastics of the Kitchener Formation that in turn conformably overlie Lower Aldridge argillite, siltstone and quartzite. The Moyie Intrusives are gabbro sills that intrude the lower, and Lower part of the Middle Aldridge Formations. Regional metamorphism is upper greenschist facies.

Geologic mapping and prospecting confirmed two previously identified styles of mineralization. Base metal sulphide mineralization (pyrite, sphalerite, galena, chalcopryrite) is hosted by Middle Aldridge siliciclastic rocks at the Main Showing. Minor sulphide mineralization (pyrite, sphalerite, chalcopryrite) occurs in quartz veins hosted by the Moyie sills. Mapping could not trace the favourable horizon or structure that hosts the main showing mineralization. Similarly, the source of several mineralized arenite cobbles and boulders is still unknown. Detailed mapping and sampling of the main showing was conducted to establish the extent and nature of alteration and mineralization.

Stream sediment sampling was carried out on all drainages that traverse the claims. Only low base metal concentrations were returned by silt sampling though several bulk sediment samples have enriched values in gold, ranging from 50 to 765 ppb.

A soil orientation geochemical survey and limited soil geochemical surveys on four grids were carried out to trace outcropping and float mineralization. Geochemically enriched concentrations of Pb, Zn and As are present in samples from the Main Showing Grid. Geochemical values for all other elements analyzed in soils from the Main Showing and the other three grids are low and reflect background concentrations.

Grab samples of main showing sulphide mineralization, a large float boulder, and a few smaller float samples of mineralized arenite have the highest concentrations of Pb, Zn and Ag; **0.41 to 4.2%**, **0.36 to 7.1%** and **4.2 to 130 ppm**, respectively.

The **1989** exploration programme delineated no new geological or geochemical targets that could support additional work at this time. Surface mineralization at the Main Showing is not economic.

Total expenditures that may be applied to assessment on the Fors Property in **1989** are **\$109,288.71**.

### **3.0 RECOMMENDATIONS**

It is recommended that no new work be undertaken on the Fors property and the option agreement be terminated.

### **4.0 PROPERTY DEFINITION**

#### **4.1 Location and Access**

The Fors Property is centred at **49°21' N** latitude and **115°55' W** longitude, **17 kilometres** southwest of Cranbrook, British Columbia in the Fort Steele Mining Division (Figure 1). Access is by paved Highway **3/95** to Green Bay on Moyie Lake, west to Monroe Lake and along a well-maintained, gravel logging road to the property. Several older logging tracks afford four-wheel drive access within the property boundary.

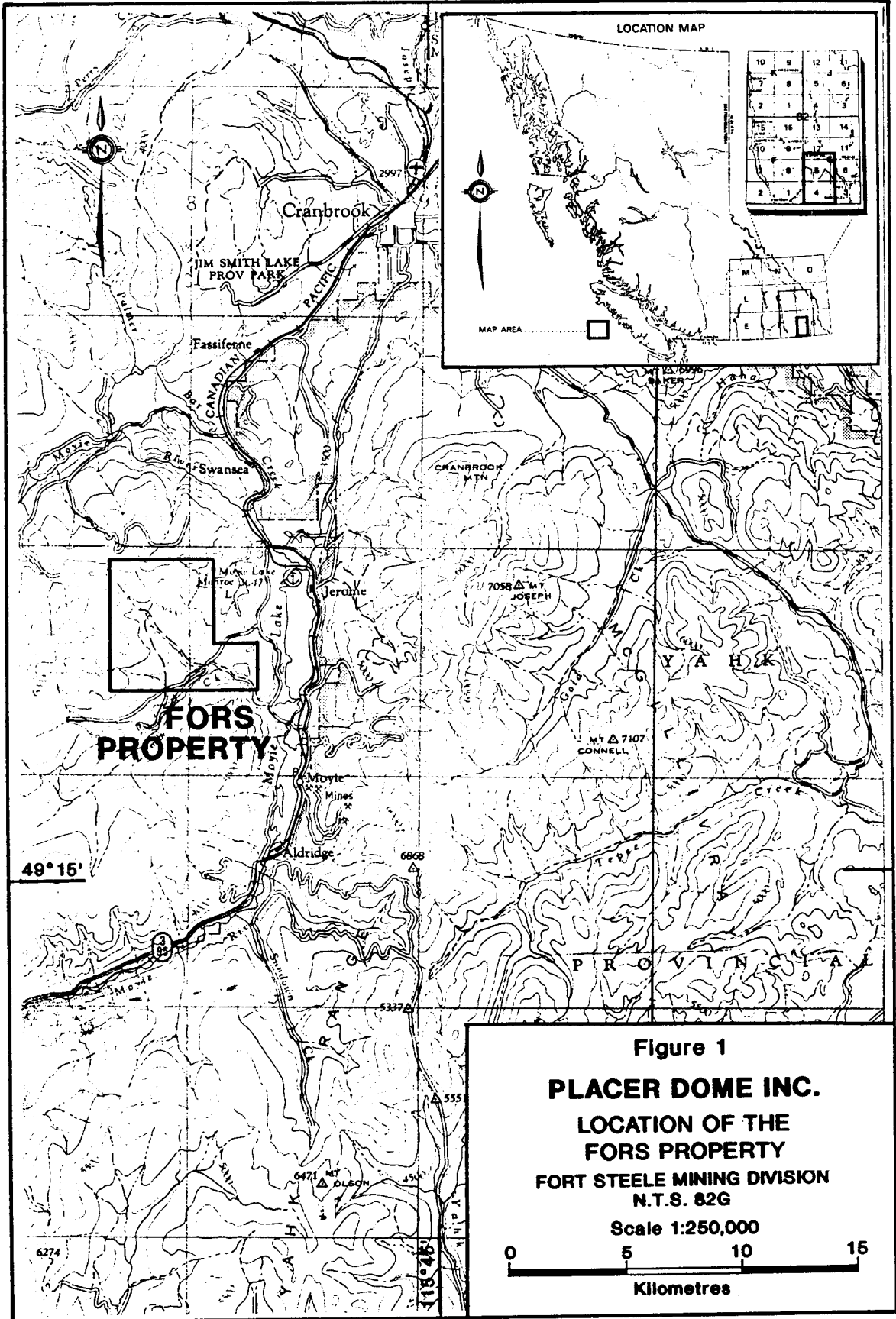
The Canadian Pacific Railway line is approximately 3 kilometres to the northeast and a B.C. Hydro right-of-way parallels Highway **3/95** approximately 4 kilometres east of the claims.

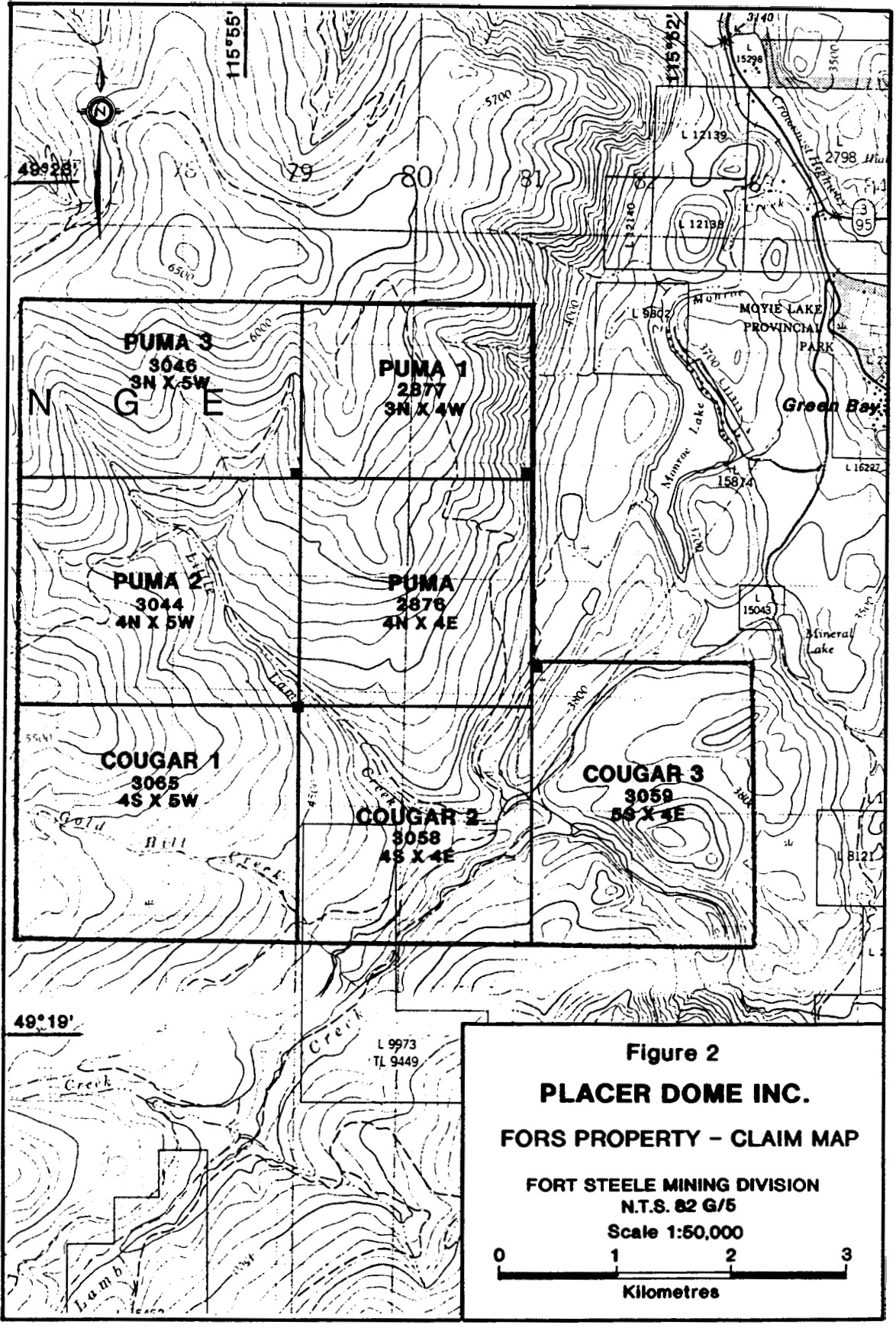
#### **4.2 Physiography**

The property is west of the Rocky Mountain Trench in the Moyie Range of the Purcell Mountains. The claims lie west of Moyie Lake and incorporate Little Lamb Creek and Gold Hill Creek, the main drainages on the property. The two creeks flow southeast to Lamb Creek, which in turn flows southeast to Moyie Lake.

The climate is transitional between maritime and continental exhibiting low to moderate mean monthly precipitation totals of **30 millimetres**. Mean seasonal monthly high temperatures are comparable to Cranbrook at **26°C** in July and **-5°C** in January.

The entire property is below timberline and has a maximum relief of approximately **850 metres**. The claims lie between **1067 metres** elevation (**A.S.L.**) in the southeast and **1,920 metres** in the north (Figure 2).





The slopes are well timbered with spruce, larch, lodgepole pine, white pine, alpine fir and sparse to very thick underbrush. Parts of the property have been clear-cut logged. Partial reforestation took place during the 1989 exploration season. At lower elevations the slopes are mantled by Quaternary and Recent sand and gravel resulting in poor outcrop exposure. The best exposure is afforded at higher elevations and along road cuts.

Glacial striae were mapped at several locations and trend north-northeast. The direction of ice advance was probably to the northeast down the valley of Lamb Creek.

#### 4.3 Claim Status

The Fors Property consists of seven contiguous mineral claims comprising 119 units jointly owned by Messrs. L. Morgan, C. Kennedy and R.T. Banting of Cranbrook, British Columbia and Mr. J. Morgan of Victoria, British Columbia. Table 1 summarizes the claim status of the property.

Table 1: Claim Status

Claim Name	No. Units	Record No.	Anniv. Date
Puma	16	2876	April 27, 1993
Puma 1	12	2877	April 27, 1993
Puma 2	20	3044	April 27, 1993
Puma 3	15	3046	April 27, 1993
Cougar 1	20	3065	April 27, 1993
Cougar 2	16	3058	April 27, 1993
Cougar 3	20	3059	April 27, 1993

#### 4.4 Exploration History

The Fors Property and immediately surrounding area has been prospected at various times, particularly following the discovery of Pb-Zn-Ag mineralization in 1893 at St. Eugene on Moyie Lake. Several small pits, trenches and adits probably date to this period. During 1966 H. Fors of Kimberley discovered float boulders containing significant Pb-Zn mineralization.

The property was worked intermittently by Cominco Ltd. in 1966, 1967, 1976, 1978, 1982 and 1983. Limited soil geochemical, geophysical and geological surveys and diamond drilling were carried out in the area of the Main Showing. As of 1967 Cominco workers had documented "significant values in Pb and Zn" in float boulders. Their exploration programmes were directed toward locating the source of this material.

Records of much of the Cominco work were not available to Placer Dome but some of Cominco's conclusions are known: 1) an EM survey showed no significant conductors; 2) soil geochemistry outlined Pb and Zn anomalies in the vicinity of the main showing; and 3) vein mineralization found during geological mapping was not considered economically important due to "poor

grade and lack of continuity" (Richardson and Gifford, 1967?). According to Webber (1978), in a summary of exploration in the area, 7 diamond drill holes totalling 944 metres encountered no economic mineralization. Apparently, Cominco did not analyze for gold during their exploration programmes on the Fors Property.

#### 4.5 Summary of Work

From May 16 to July 15, 1989 240 person-days were spent conducting geological mapping, prospecting and geochemical sampling on the Fors Property. The field crew consisted of a project geologist, geologist and two field assistants. Operations were based at Green Bay on Moyie Lake and at Cranbrook, British Columbia.

The property was mapped and prospected at 1:10,000 scale. Detailed mapping of the Main Showing at 1:100 scale was completed over an area 150 by 25 metres. Figure 3 illustrates the geology at 1:10,000 and Figure 4 is the rock sample location map. Figure 5 is the Main Showing geology and sample location map reduced to 1:200 scale.

A total of 58 silt, 57 bulk stream sediment, 751 soil and 110 rock samples were taken during the course of geochemical surveys. Most samples were analyzed at the Placer Dome Inc. laboratory in Vancouver. A total of 57 organic soil samples were submitted to Activation Laboratories Ltd. of Brantford, Ontario for neutron activation analyses. All samples were analyzed for copper, lead, zinc, silver, gold and arsenic. Some samples of mineralized arenite from the main showing and several float boulders were also analyzed for antimony.

Figure 6 shows stream sediment sample sites and the location of the soil survey grids. Figures 7 to 18 are individual element plots of copper, lead, zinc, silver, gold and arsenic in soil for each grid.

### 5.0 ECONOMIC ASSESSMENT

There are three deposit types of potential economic interest in the region: 1) stratiform Pb-Zn-Ag sedimentary exhalative mineralization associated with the Lower-Middle Aldridge contact; 2) base metal-silver vein deposits cross-cutting Aldridge units; and 3) mineralized (base metal-Au) quartz veins in the gabbroic Moyie intrusives.

The most important economic deposit in the region is the Sullivan orebody near Kimberley, British Columbia. The deposit is a large, gently dipping iron-lead-zinc sulphide body lying conformably in Proterozoic clastic sedimentary rocks of the Aldridge Formation at the Lower to Middle Aldridge transition time horizon. The orebody is a stratiform lens with subordinate bands covering an area of 1.6 by 2.0 kilometres composed almost entirely of pyrrhotite, sphalerite, galena and lesser pyrite. It is estimated to have originally contained 160,000,000 tonnes of 28% iron, 6% lead, 6% zinc and 67 g/t silver (Hamilton *et al.*, 1982). Cominco Ltd. has recently halted production at the Sullivan Mine citing declining metal prices and increasing production costs.

Several base metal-silver vein deposits in the area have been historically exploited. The most prominent example is the St. Eugene mine that lies about **2,000** metres above the base of the Middle Aldridge on the east shore of Moyie Lake. The deposit is a ladder vein striking west-northwest and dipping steeply south. The ore is argentiferous galena and sphalerite with some tetrahedrite and chalcopyrite in a gangue of dominantly quartz. When reserves were exhausted in **1916**, production had totalled **931,431** tonnes grading **12%** lead, **1%** zinc and **200** g/t silver (Hoy et al., **1985**). The vein system can be traced for **3,500** metres along strike and **1,400** metres down dip.

In the past gold has also been an exploration target in the region. The target of greatest interest was gold in quartz-sulphide veins associated with shears in the metagabbro Moyie intrusives. At least two adits were driven on quartz veins hosting sulphide mineralization on the Fors Property. There is no known record of production from these workings.

## 6.0 REGIONAL GEOLOGY

The following synopsis of the regional geology of the Purcell Supergroup is based on that of Hamilton *et al.* (**1982**) and Hoy (**1982**). Rocks underlying the Fors property are in the Purcell anticlinorium of the Purcell Supergroup, laterally equivalent to the Belt Supergroup in the United States. The Purcell Supergroup in southeast British Columbia constitutes a thick prism of dominantly clastic sedimentary rocks deposited in a large epicratonic basin at the western margin of the North American craton during Middle Proterozoic time.

The maximum thickness of sedimentary rocks of the Purcell Supergroup exceeds **10,000** metres. Earliest known sedimentation resulted in upward-fining sequences of quartz arenite, quartz-wacke and mudstone that comprise the basal Fort Steele Formation. The Fort Steele Formation is at least **200** metres thick.

Fine-grained clastic beds at the top of the Fort Steele Formation grade into rust weathering, fine-grained quartz-wacke and mudstone of the Aldridge Formation. The Aldridge Formation is at least **5,000** metres thick in the Purcell Mountains and grades upward over **300** metres through a sequence of carbonaceous mudstone and fine-grained quartz-wacke to the 1,800 metre thick Creston Formation. Creston strata are composed of grey, green and maroon quartz-wacke and mudstone with minor white arenite.

Conformably overlying the Creston Formation are **1,200** metres of green and grey dolomitic mudstone, buff-weathering dolomite and minor quartz arenite of the Kitchener Formation. The Kitchener is in turn overlain by **200** to **400** metres of green, slightly calcareous mudstone of the Siyeh Formation. The Siyeh is conformably and locally unconformably overlain by 0 to **500** metres of basaltic to andesitic flows of the Purcell Lava, which are taken to mark the close of lower Purcell sedimentation (Hamilton *et al.*, **1982**).

Resting with apparent conformity on the lower Purcell rocks are about **1,200** metres of grey to dark grey, calcareous and dolomitic mudstone and minor quartz-wacke of the Dutch Creek Formation. In the western Purcell Mountains, the Dutch Creek Formation is overlain by about **1,000** metres of grey, green and maroon mudstone and calcareous mudstone of the Mount Nelson Formation. The close of Purcell sedimentation is marked by folding during the East Kootenay Orogeny (**825** to **900** Ma; Hoy, **1982**) and disruption of the basin by large-scale vertical faults.



Middle Proterozoic igneous activity in the Purcell sedimentary basin is dominated by intrusion of gabbroic sills of two ages. The oldest are the Moyie sills (1,430 Ma; Hamilton *et al.*, 1982) which are most common in the Aldridge Formation. Gabbroic sills can total 2,000 metres of thickness in an Aldridge section and are most abundant in the Lower Aldridge. The youngest event of gabbro intrusion is thought to be comagmatic with the Purcell lavas (1,075 Ma) (Hamilton *et al.*, 1982).

Lower Purcell sedimentary rocks have everywhere undergone metamorphism to at least greenschist facies. Minor areas of amphibolite facies metamorphism are restricted to the cores of large magnitude fold structures.

Purcell rocks are folded about north-trending axes to form the Purcell anticlinorium. Folds comprising the large structure are open and gentle with north-plunging axes. Major faults (e.g. Moyie and St. Mary's faults), with a history of complex movement, disrupt the Purcell rocks and separate large areas further disrupted by block faulting. Both the Moyie and St. Mary's faults repeat lower Purcell strata on their northwest upthrown sides. There is evidence for repeated movement along the major faults beginning as early as the time of Purcell sedimentation (Hoy, 1982).

## 7.0 PROPERTY GEOLOGY

### 7.1 Lithology

Much of the 1:10,000 geological mapping of the Fors Property (Figure 4) in 1989 relied heavily on 1:50,000 scale regional mapping by provincial government geologists (Hoy *et al.*, 1980). An attempt was made, wherever possible, to place the property-scale mapping within the context of the regional government map.

The Fors Property is underlain dominantly by clastic rocks of the Purcell Supergroup of Helikian and Hadrynian age. Units of the Lower and Middle Aldridge and Kitchener Formations, as well as at least three Moyie sills or sill-like bodies can be mapped on the property.

The oldest rocks in the map area are rust-weathering siltstone, quartz arenite and quartzite of the Lower Aldridge that outcrop in the southwest, and to a lesser extent in the east, in the hangingwall of the Moyie fault.

Grey-weathering, graded, quartz (quartz-feldspar) arenite and quartz-wacke beds are representative of the Middle Aldridge on the property. These rocks are in inferred fault and conformable contact with Lower Aldridge rocks in the east and west, respectively. The boundary between the Lower and Middle Aldridge is gradational and Hoy *et al.* (1980) place it at the surface above which grey-weathering quartz-wacke beds predominate over siltite. This boundary was not observed on the property.

Grey-weathering, graded, quartz-wacke beds interpreted to be turbidite deposits occur throughout the Middle Aldridge. In general, the Middle Aldridge quartz-wacke beds become thinner, less pure, and less volumetric up-section (Hoy *et al.*, 1980).

Three large (ranging from 50 to 100 metres apparent thickness) sill-like bodies of metagabbro that intrude Lower Aldridge beds outcrop irregularly in the west and are juxtaposed with Middle Aldridge quartzite arenite and quartzite to the east by the inferred Little Lamb Creek fault.

In the southeast, the Moyie fault places highly deformed Lower and Middle Aldridge rocks against less deformed, buff-weathering dolomitic siltstone and green siltstone of the Kitchener Formation.

## 7.2 Structure

The structural grain of the rocks underlying the Fors Property is northeast, paralleling the pronounced trend throughout the Purcell Mountains. Two major structural elements in the region, the Moyie anticline and the Moyie fault, have altered this structural domain.

The Moyie anticline is the dominant structure south of the Moyie fault. It is a northeast-plunging, upright, anticlinal fold. North of the fault, Lower and Middle Aldridge rocks are folded into moderately tight to dominantly open, north to northeast-trending folds. On a regional scale the folds are outlined by gabbroic sills whereas on the property scale moderate to intense deformation is indicated by bedding attitudes rotated through more than  $90^{\circ}$  in the eastern part of the property. Bedding intersections, with what are assumed to be axial planar cleavages, indicate local parasitic structural domains with fold amplitudes of up to 100 metres plunging  $10^{\circ}$  to  $20^{\circ}$  to the north and northwest.

The Moyie fault is an east-northeast-trending, north-dipping, right lateral, reverse fault. The fault outcrops in the southern portion of the property as a wide (60 metres in roadcut) zone of intense shearing in Lower Aldridge quartz-wackes of the hangingwall. In the shear, these rocks are intermixed with Kitchener siltstones from the footwall.

Smaller-scale shears (e.g. Main Showing) mapped on the property appear to mimic the Moyie fault with east-northeast orientations and shallow to moderate northwest dips. The prominent structure at the Main Showing strikes approximately  $035^{\circ}$ - $045^{\circ}$  and dips about  $40^{\circ}$  northwest. The shear can be mapped over a strike length of 15 metres crosscutting quartzite and quartz-wacke beds at shallow to moderate angles. It approaches 2.5 metres projected true width. No markers are present to afford a measurement of offset along this and similar structures.

Transverse shears in gabbro sills trend north-northwest and dip steeply to the west. These structures are often associated with hydrothermal alteration and quartz veining.

## 7.3 Alteration and Mineralization

Two previously identified styles of mineralization were mapped in outcrop on the Fors Property. Base metal sulphide mineralization at the main showing occurs within Middle Aldridge quartzite, quartz-feldspar arenite and minor argillaceous intercalations. Quartz veins in metagabbro sills host less significant base metal sulphide mineralization.

Three alteration facies are present at the main showing (Figure 5); sulphide mineralization, argillization/sericitization and locally, silicification. The intensity of alteration and mineralization increases toward the main shear indicating strong structural control. Alteration boundaries do not conform to bedding planes; discordant, irregular alteration fronts are observed in the limited exposure of the main showing (Figure 5).

Argillic and sericitic alteration of the clastic rocks is common and consists of weak to complete replacement of feldspar in the matrix by white mica and clay minerals. Clay alteration is more pronounced in the argillaceous horizons. Sericite development is readily observed in the arenaceous rocks as a bleaching and attendant reduction in hardness. Relict textures are rarely retained.

Sulphide mineralization and silicification occur together and are generally restricted to the major zone of shearing or within a few metres of it. However, minor deposition of sulphides has occurred throughout the main showing map area and is characterized by a few per cent pyrite with subordinate pyrrhotite as fine disseminations (ca. 0.5 mm) in the matrix of arenaceous rocks.

The modal volume and number of sulphide phases increase toward the shear. Within 30 metres, pyrite locally totals 10% of the rock with an attendant increase in silicification. In the shear, the rock has been completely replaced by a mixture of quartz and sulphides. Sulphides occur as bedding parallel disseminations (1.0 millimetre or less) and replacement patches (to 1.0 centimetre) where aggregates of pyrite, pyrrhotite, sphalerite, galena and chalcopyrite, in decreasing order of abundance, may compose 20% of the rock.

Two lenses of semi-massive sulphides (30 to 40% sulphide phases) occur in the shear zone. The lenses are about 0.4 metre wide and 1.0 metre long paralleling the trend of the shear.

Elsewhere on the property, quartz vein sulphide mineralization is hosted by gabbroic sills and to a lesser extent in Aldridge units. Similar mineralization has been documented in Aldridge rocks to the north and northwest. Veins in the more competent intrusives are larger and sustainable over greater strike lengths (Hoy *et al.*, 1985).

At least three quartz veins on the property have been worked in the past. The vein material is typically medium to coarse-grained and highly fractured with much iron and manganese staining. Often vuggy in habit, subhedral to euhedral quartz encloses clots of chlorite, iron oxides, and occasionally sulphides. In some instances, aggregates of sulphides, dominantly pyrite and sphalerite with minor chalcopyrite, measure up to 1.0 centimetre and total 5% of vein material. More often, highly pitted, weathered vein material exhibits a great deal of secondary iron and manganese oxides and occasionally copper carbonate.

## 8.0 GEOCHEMISTRY

### 8.1 Objectives

The stream sediment, soil and rock geochemistry programme had several objectives. Sampling of stream sediment was conducted to appraise the property with respect to undiscovered anomalous areas **as well as** determine the efficacy of drainage sediment surveys in delineating known metal anomalies. A soil geochemical orientation survey was conducted to determine the necessary information upon which to base operational procedures. Four grid areas were soil sampled to better delineate areas of known mineralization in outcrop and float. It **was** hoped that rock analyses would identify the **types of** lithology/horizon, structures and/or alteration associated **with** high metal values.

### 8.2 Stream Sediments

#### 8.2.1 Sample Collection, Preparation and Analysis

**An** in-house technique termed "bulk stream sediment sampling" was developed by Placer Dome exploration personnel. It is specifically designed for use in detailed and semi-detailed stream sediment geochemical surveys where metals and metal-bearing minerals that give **long** mechanical dispersion trains are exploration targets. This **exploration** technique was employed on the Fors Property. Bulk stream sediment samples were collected every 200 to 300 metres along water courses (Figure 6) from natural drop-out sites for heavy minerals in the stream channels. Examples of these sites included plunge pools, riffles and the upstream side of channel bars. Stream sediments from the selected sites were wet sieved through a 20 mesh stainless steel screen and caught in an aluminum basin. A steel shovel was used to dig the sediment. Approximately two to three kilograms of sieved sample were collected and transferred to a plastic bag to complete a sample.

Conventional silt samples were collected at each sample station to identify any hydromorphically dispersed metal anomalies. The samples weighing from 200 to 300 grams were taken from quiescent parts of the stream channel. **An** effort was made to collect material of the same fineness and organic content at each site. A steel trowel was used to transfer the sample to a **kraft** paper bag. The samples were air-dried in the bags and then shipped for analysis.

Descriptions of the sample sites for both bulk sediment and silt samples were recorded and are on file in the Placer Dome Vancouver office. Stream channels draining the Fors Property are first to fourth order streams (Figure 6). Abrading channels **predominate** in the drainages. Near-bank sites, channel and point bars were the most favourable locations for bulk sediment sample collection. Discharge conditions ranged from low to normal during sampling.

All stream bulk sediment and silt samples were analyzed at Placer Dome's laboratory in Vancouver. The bulk sediment samples were oven-dried and sieved to produce a -150 mesh fraction. This fraction was geochemically analyzed for Au, Ag, Cu, Pb, Zn and As. Each bulk sediment sample was analyzed three times for gold in an attempt to address the erratic gold distribution in natural materials, i.e. the "nugget-effect". Silt samples were oven-dried and sieved to produce a -80 mesh fraction that was also analyzed for Au, Ag, Cu, Pb, Zn and As. The extraction and analytical procedures used in the laboratory are summarized in Appendix 5.

### 8.2.2 Results

A list of the analytical results for the fifty-seven bulk stream sediment and silt samples is given in Appendix 2. The small number of samples precludes a statistical treatment of these data sets. Consequently only a visual inspection of the results was carried out.

Gold concentrations of less than **15 to 20 ppb** in the bulk sediment samples are considered to be threshold and background values. Gold from 20 to 50 ppb is weakly anomalous; from 50 to 100 ppb is moderately anomalous; while values greater than 100 ppb are highly anomalous.

The triplicate gold analyses for each stream sediment bulk sample demonstrates the erratic distribution of gold in natural materials and the necessity for multiple determinations. Highly anomalous concentrations of gold were obtained in a single split from each of six bulk samples and range from 125 to **765 ppb**. All five moderately anomalous values reported are from samples taken in the Little Lamb Creek drainage. Weakly anomalous values are reported for twenty-two samples.

The bulk sediments with the best gold results were collected from the lower reaches of Little Lamb Creek and just below its confluence with Lamb Creek. Two samples, **04774** and **04786**, from the upper reaches of Little Lamb Creek also returned highly anomalous concentrations of gold in at least one split.

Geochemical results for all other elements analyzed in the sample set are low and reflect **background concentrations**. Similarly, results returned from **analyses of all silt samples are low and** reflect background concentrations. **Though one sample, FSS-53, returned** a weakly anomalous value of 112 ppm for zinc.

### 8.2.3 Discussion and Interpretation

The **1989** stream sediment sampling programme delineated no base metal anomalies in either silt or bulk sediment samples. The moderate to **highly** anomalous gold values returned by several bulk sediment samples are **the** only results of interest.

The majority of the highly anomalous gold values are from sample sites on the lower reaches of Little Lamb Creek and below its confluence with Lamb Creek. Examination of their distribution reveals no clear pattern suggestive of upstream cut-offs for anomalous samples. These results probably do not indicate the presence of multiple "gold-only" input sources in the surface drainage. They more likely reflect inconsistencies in the quality of the sample sites or the naturally erratic gold distribution in the sample material. Consequently, it is suspected that a single source is responsible for these anomalies. There are no assemblages of associated elements that may help to indicate the nature of the parent source.

## 8.3 Soils

### 8.3.1 Sample Collection, Preparation and Analysis

A total of **554** soil samples were taken over four small grid areas (Figure 6). Closely spaced samples were collected over the Main Showing to establish the extent of the known mineralization. The three other soil grids were laid out to cover areas where sulphide-bearing float had been found. The grids were oriented in such a way as to take into account direction of glacial advance, fluvio-glacial runoff and local slope direction.

The Main Showing Grid consists of **8** lines of **400** metres spaced **40** metres apart. Sample stations are every **20** metres for a total of **160** sites. The Boulder Grid is 5 contour traverses of **12** stations spaced every **40** metres. The traverses are approximately **100** metres apart. A total of **60** sites were sampled. Little Lamb Creek Grid is located in the northeast corner of the property and consists of **10** lines spaced **100** metres apart. Each line is **1,000** metres long with sample spacings of **40** metres for a total of **250** samples. The smaller Gold Hill Creek Grid is located in the southwest corner of the property. A total of **84** samples were taken, one every **40** metres along 7 lines 500 metres in length. The line spacing is **100** metres.

A steel mattock, plastic spoon and kraft paper bag were used to obtain and package the samples. 'B' horizon soil was collected from most sites. Sample depths ranged from **10.0** to **50.0** centimetres and average **15.0** to **20.0** centimetres. Notes on the nature of the soil material taken and on site conditions were recorded in the field and used in the interpretation of geochemical data. The notes are on file at the Placer Dome office in Vancouver.

The soil samples were forwarded to the Placer Dome laboratory in Vancouver where they were oven dried and sieved to produce a -80 mesh fraction. A sub-sample was weighed for geochemical analysis. Each sample was analyzed for Au, Ag, Cu, Zn, Pb and As. The digestion and detection techniques used for each element are given in Appendix 5.

### 8 3 2 Orientation Survey

**An** orientation survey was completed to determine the character of **geochemical dispersion** in soils related to mineralization on the Fors Property. The objectives of the survey included: 1) define background and anomalous geochemical responses; 2) define optimum survey procedures; and 3) identify factors that influence dispersion and are thus criteria for the interpretation of survey results.

The survey consisted of 197 samples taken at 53 stations spaced 20 metres apart along a chained line 1,060 metres in length. The survey line traversed the Main Showing mineralization and was continued well beyond the mineralization to adequately define background conditions.

Soils on the Fors Property are generally well drained and moderately well developed. **Typical soil profiles encountered** included the A, B<sub>1</sub>, B<sub>2</sub>, and B<sub>3</sub>/C horizons. **Results from the orientation survey** indicate analyses of Pb and to lesser degrees Zn and As in B horizon material best trace mineralization in bedrock. The B horizon, the zone of mineral accumulation, is transitional to the underlying soil parent material. In typical soil profiles on the Fors Property, the B horizon is of variable thickness and grey-brown to orange-brown in colour.

The soils have developed on a variety of parent materials including weathered bedrock, glacial till and colluvium. **In areas of greater relief, bedrock is the principal substrate**, while transported overburden dominates in valleys and on shallower slopes. Glacial till is recognized by poorly sorted sub-rounded to rounded clasts of varied lithology. In contrast, soil developed in situ and from down-slope mass-wasting of bedrock is recognized by a degree of lithological uniformity, grain size composition and by the angularity of the clasts.

### 8 3 3 Results

A list of the analytical results for the soil samples is given in Appendix 3. Plots for Pb, Zn, Cu, As, Ag and Au in soils for the four grids are presented in Figures 7 to 18.

Only soils from the main showing area returned significant metal concentrations. Results from the Boulder Grid, Little Lamb Creek Grid and the Goldhill Creek Grid are of background to weakly anomalous concentrations for all elements analyzed and will not be discussed further.

Limited statistical analyses were performed on the data. Lead (Figure 7a), zinc (Figure 7b) and arsenic (Figure 8b) data from the Main Showing Grid provide the only useful statistical populations. A single coherent anomaly for each of the three elements can be identified.

The lead, zinc and arsenic anomalies are approximately coincident. The anomalies are roughly centred on the Main Showing, trend northeast-southwest and are oriented at an oblique angle to the slope. They vary little in length along their trend; the lead anomaly is about 350 metres long and the zinc and arsenic anomalies are both approximately 300

metres in length. The anomalies are approximately **100** metres across at their widest points representing from three to four adjacent sites of anomalous to highly anomalous values. Metal concentrations range from 200 to **960** ppm Zn, **100** to **660** ppm Pb and **50** to **160** ppm As. In each case, the anomalies are open to the northeast and, to a lesser extent, the southwest. At the northern end of the grid, the zinc anomaly extends downslope approximately **150** metres and is open to the east.

A second, weaker, zinc anomaly located in the southeast part of the grid is open to the east as well. This anomaly is small, roughly **50** by **100** metres, and dominated by two isolated, highly anomalous samples (**520** and **580** ppm). At its widest, the anomaly consists of eight adjacent anomalous sites.

In addition to the anomalies described above, there are a few isolated one to two-sample occurrences of anomalous to highly anomalous values in lead, zinc and arsenic.

### **83.4 Discussion and Interpretation**

The zinc, lead and arsenic anomalies of the Main Showing Grid are adjacent to and slightly downslope from Main Showing sulphide mineralization (Figures 7a, 7b, 8b). The pattern of the soil anomalies parallels the northeast strike of the mineralized shear and appears to trace unexposed mineralization along strike. The downslope extension of the anomalies is likely attributable to mechanical dispersion of mineralized material. Hydromorphic processes probably account for the greater dispersion of zinc downslope in the surface environment.

The smaller zinc anomaly and the few spot anomalies are likely attributable to the presence of isolated mineralized float. These anomalies are not considered important exploration targets.

## **8.4 Rocks**

### **8.4.1 Sample Collection, Preparation and Analysis**

All rock samples submitted for analysis during the **1989** exploration programme were grab or composite samples of representative lithology, alteration or mineralization. The rock samples were sent to the Placer Dome Inc. laboratory in Vancouver for analysis. The samples were crushed and pulverized; a sub-sample was weighed, digested and analyzed geochemically for Pb, Zn, Cu, As, Ag and Au. Several samples of mineralization from the main showing were also analyzed for Sb. Extraction and detection techniques used by the laboratory are summarized in Appendix **5**.



## 8.42 Results

The geochemical results for the rock samples are listed in Appendix 4. A statistical analysis of the data was not carried out. Figure 4 shows the locations of the rock samples on a property scale while Figure 5 shows rock sample locations at the main showing. The element analyses are not plotted on the maps.

A total of **110** rock samples were submitted for analyses. Eleven samples returned anomalous to highly anomalous base metal concentrations. Seven grab samples of mineralization at the Main Showing returned values enriched in silver, lead, zinc, arsenic and antimony. The ranges of values for these samples are as follows: **15 to 130 ppm Ag; 0.41 to 4.2% Pb; 2100 ppm to 7.1% Zn; 460 ppm to 0.90% As; and 240 ppm to 1.45% Sb**. Similarly enriched values were returned by two samples of a large float boulder (**53095** and **53096**; Boulder Grid) west of the Main Showing. A small float boulder of mineralized quartz arenite near the eastern boundary of the property (**76022**) returned values of **1.5 ppm Ag, 240 ppm Pb and 0.40% Zn**. A grab sample (**53056**) of quartz vein sulphide mineralization just off the property to the east returned **0.58% Pb and 4.2 ppm Ag**.

A number of float boulders of quartz-wacke and quartz arenite found on the property contain minor sulphide mineralization, usually as fine-grained iron sulphides. These samples are only weakly enriched in base metals.

Several samples of quartz veining in gabbro and quartz vein float with minor disseminated pyrite and chalcopyrite have elevated concentrations of copper that range up to **960 ppm**. These samples (**53062, 53063, 53064, 53068** and **53071**) are from the vicinity of old exploratory trenches in the southern part of the property.

## 8.43 Discussion and Interpretation

The best results returned are from the sulphide mineralization at the Main Showing and from quartz-wacke and quartz arenite float boulders that contain similar sulphide mineralization. The surface mineralization at the Main Showing is limited and traceable to the zone of shearing that crosscuts bedding at a shallow angle.

A bedrock source was not traced for the samples of weakly mineralized float that are similar in lithology to the Aldridge units exposed on the property. Many of these samples are moderately to well-rounded, indicating possible transport from outside the claims.

Other minor base metal values are from the irregular sulphide mineralization associated with quartz veins in metagabbro dykes.

## 9.0 STATEMENT OF EXPENDITURES

The following field expenditures were incurred by Placer Dome Inc. to conduct geochemical and geological surveys on the Fors Property during the period of May 16 to July 15, 1989.

### Personnel Costs

G. Shevchenko (Senior Geologist)	
May 16-18/89; 2 days x \$375	750.00
M.B. Gareau (Senior Geologist/Geochemist)	
June 22/89; 1 day x \$375	375.00
P.J. Maheux (Project Geologist)	
May 16-July 15/89; 61 days x \$334	20,374.00
B. Madu (Geologist)	
May 16-July 15/89; 61 days x \$244	14,884.00
B. Veilleux (Field Assistant)	
May 16-July 15/89; 61 days x \$192	11,712.00
B. Leong (Field Assistant)	
May 16-July 15/89; 61 days x \$167	10,187.00
<b>Analytical Costs (Cu Pb, Zn, Au, Ag, As)(Sb)</b>	
Soils 698 x \$17.75	12,389.50
53 x \$12.50	662.50
Rocks 110 x \$20.25	2,227.50
Stream 57 x \$21.75	1,239.75
Silt 58 x \$17.75	1,029.50
<b>camp operations</b>	
Accommodation at Green Bay - 54 days	3,541.32
Accommodation at Cranbrook - 7 days	880.00
Meals - 61 days x 4 persons x \$24/person/day	5,856.00
<b>Vehicle Expense</b>	
Rental - 3/4 ton 4x4 P/U @ \$45/day x 61	2,745.00
3/4 ton 4x4 wagon @ \$57/day x 61	3,477.00
Repairs	258.44
Fuel	2,453.97
<b>Report Preparation</b>	
P. Maheux 15 days x \$334	5,010.00
M. Gareau 3 days x \$360	1,080.00
Typist 2 days x \$105	210.00
Drafting 5 days	1,156.00
<b>Miscellaneous</b>	
Telephone and Teletype	408.52
Freight	271.00
Supply Purchase	5,810.71
Map Production	200.00
Report Production	100.00
<b>TOTAL</b>	<b>\$109,288.71</b>

## **10.0 CONCLUSION**

**The 1989 exploration programme on the Fors Property failed to find evidence of previously unknown base metal mineralization. Surface mineralization at the Main Showing appears to be structurally controlled and is not economic.**

**Respectfully submitted by,**

**P.J.Maheux**

## 11.0 REFERENCES

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- Hoy, T., Diakow, L. and Chicorelli, P., **1980**, Geology of the Moyie Lake Area: British Columbia Ministry of Energy, Mines and Petroleum Resources, Preliminary Map No. **49**.
- Richardson, J. and Gifford, B., **1967?**, Assessment Report on the Fors Property: Cominco Ltd., unpublished company report, **5** p.
- Webber, G.L., **1978**, Geological Report, Vine Property, N.T.S. **82G/5**: Cominco Ltd., Kootenay Exploration, unpublished company report, **14** p.

**APPENDIX 1**  
**STATEMENT OF QUALIFICATIONS**

## STATEMENT OF QUALIFICATIONS:

I, Pierre J. Maheux, of the City of Vancouver, British Columbia, do hereby certify that:

1. I **am** a geologist.
2. I am a graduate of Queen's University at Kingston, Ontario where I received a Bachelor of Science degree (Honours, Specialization) in geology dated October, **1983**.
3. I am a graduate of The University of Alberta at Edmonton, Alberta where I received a Master of Science degree in geology dated June, **1989**.
4. I am a member in good standing of the Geological Association of Canada, The Geological Society of America, The Society of Economic Geologists, The Geochemical Society, The Canadian Institute of Mining and Metallurgy and The Prospectors and Developers Association of Canada.
5. I have been engaged in the study of, and exploration for mineral deposits throughout Canada on a full or part-time basis since **1980**.
6. I supervised and participated in the **1989** field programme on the Fors Property. I evaluated the results of this work and wrote this report.



Pierre J. Maheux

**APPENDIX 2**

**STREAM SEDIMENT SAMPLE ANALYTICAL RESULTS**

fors property conventional stream sediment geochemistry

<i>SAMEJ</i>	<b>AG</b> PPM	<b>AS</b> PPM	<b>AU1</b> PPB	<b>CU</b> PPM	<b>PB</b> PPM	<b>ZN</b> PPM
FSS01	<0.2	<2	<5	9	<b>11</b>	40
FSS02	<0.2	4	10	14	14	40
FSS03	<0.2	2	<5	13	14	42
FSS04	<0.2	6	25	14	13	35
FSS05	<0.2	<2	20	13	13	37
FSS06	<0.2	3	10	14	13	35
FSS07	<0.2	<2	20	16	13	34
FSS08	<0.2	<2	5	16	12	32
FSS09	<0.2	<2	5	15	13	34
FSS10	<0.2	3	<5	16	13	35
FSS11	<0.2	6	<5	18	12	34
FSS12	<0.2	2	<5	19	12	37
FSS13	0.3	3	<5	27	33	80
FSS14	<0.2	4	<5	21	28	68
FSS15	<0.2	5	<5	16	19	60
FSS16	<0.2	4	<5	16	21	63
FSS17	<0.2	4	<5	18	23	70
FSS17*	<0.2	3	<5	18	23	72
FSS18	<0.2	<2	5	10	17	45
FSS19	<0.2	2	<5	17	27	76
FSS20	<0.2	5	<5	18	25	71
FSS21	<0.2	<2	<5	15	19	53
FSS22	<0.2	<2	5	12	16	51
FSS23	0.4	<2	10	12	20	51
FSS24	<0.2	<2	<5	10	17	40
FSS25	<0.2	<2	5	13	21	70
FSS26	<0.2	<2	<5	6	<b>11</b>	34
FSS26*	<0.2	<2	<5	6	<b>11</b>	33
FSS27	<0.2	<2	<5	<b>11</b>	21	53
FSS28	<0.2	2	<5	9	12	40
FSS29	<0.2	<2	<5	10	16	48
FSS30	<0.2	<2	<5	8	14	40
FSS31	<0.2	<2	<5	8	13	43
FSS32	<0.2	<2	<5	7	13	37
FSS33	<0.2	<2	<5	7	14	42
FSS34	<0.2	<2	<5	8	14	42
FSS35	<0.2	<2	<5	8	14	53
FSS36	<0.2	2	<5	7	12	42
FSS37	<0.2	<2	<5	6	12	36
FSS38	<0.2	<b>3</b>	<5	<b>11</b>	15	42
FSS39	<0.2	5	<5	13	16	44
FSS40	<0.2	3	<5	<b>11</b>	14	38
FSS41	<0.2	<2	<5	12	13	45
FSS42	<0.2	3	<5	15	17	58
FSS43	<0.2	5	<5	<b>11</b>	14	40
FSS44	<0.2	2	<5	<b>11</b>	14	42
FSS44*	<0.2	<2	<5	12	14	45
FSS45	<0.2	2	<5	10	12	30
FSS46	<0.2	3	<5	9	13	37
FSS47	<0.2	5	<5	10	12	33
FSS48	<0.2	2	<5	13	60	30
FSS49	<0.2	7	<5	10	10	28
FSS50	<0.2	2	<5	10	10	27
FSS51	<0.2	4	<5	22	28	83
FSS52	<0.2	5	<5	24	30	95
FSS53	0.2	6	<5	38	37	112
FSS53*	0.2	6	<5	37	36	108
FSS54	0.3	<2	25	31	27	81
FSS55	0.2	<2	<5	24	19	54
FSS56	0.5	8	<5	57	50	92
FSS57	0.4	<2	25	43	42	87



FSS57*	0.4	2	31	43	41	86
FSS58B	0.2	<2	15	20	22	62
FSS58B*	0.3	<2	10	20	22	60

fors property bulk stream sediment geochemistry

SAMP	AG PPM	AS PPM	AU-A PPB	AU-B PPB	AU1 PPB	CU PPM	PB PPM	ZN PPM
04753	<0.2	3	25	<5	<5	13	17	61
04754	<0.2	<2	<5	<5	<5	18	20	54
04755	<0.2	4	<5	15	10	18	22	58
04756	<0.2	2	5	5	20	22	20	59
04757	<0.2	2	<5	<5	5	20	21	55
04758	<0.2	<2	<5	50	15	23	20	58
04759	<0.2	<2	20	10	15	22	20	55
04760	<0.2	2	15	<5	<5	24	16	47
04761	<0.2	<2	10	5	10	29	22	56
04761*	<0.2	<2	<5	15	NSS	29	23	60
04762	<0.2	<2	10	5	<5	25	20	53
04763	<0.2	<2	5	5	5	24	19	47
04764	<0.2	<2	10	5	<5	21	17	40
04765	<0.2	3	10	5	10	20	31	72
04766	<0.2	<2	10	<5	25	15	18	53
04767	<0.2	5	<5	<5	<5	23	25	62
04768	<0.2	<2	5	<5	10	19	25	68
04769	<0.2	<2	5	NSS	<5	15	20	58
04770	<0.2	3	25	<5	<5	10	20	55
04772	0.2	4	35	NSS	55	18	25	70
04773	<0.2	4	50	15	<5	15	21	59
04774	<0.2	<2	<5	<5	170	9	12	42
04775	0.3	2	<5	16	40	9	14	53
04776	<0.2	<2	15	<5	30	11	19	53
04777	0.5	<2	10	25	40	10	16	54
04778	<0.2	<2	35	<5	25	9	12	38
04779	<0.2	2	20	<5	30	8	15	40
04780	0.6	4	40	40	5	12	24	46
04781	<0.2	<2	15	NSS	<5	10	14	42
04782	<0.2	4	20	<5	10	8	11	33
04783	<0.2	3	10	<5	5	6	10	28
04784	0.3	2	40	10	40	7	12	36
04785	<0.2	<2	30	<5	<5	8	12	37
04786	<0.2	2	125	5	<5	7	11	35
04787	<0.2	<2	50	<5	<5	11	16	64
04788	<0.2	<2	19	NSS	<5	9	16	45
04788*	<0.2	<2	NSS	NSS	<5	9	16	41
04789	0.2	2	<5	<5	<5	12	18	44
04790	<0.2	<2	20	<5	<5	15	18	52
04791	<0.2	<2	45	<5	20	15	17	45
04792	<0.2	<2	60	15	<5	14	17	45
04793	<0.2	<2	35	30	<5	11	14	36
04794	0.3	<2	25	<5	100	12	15	35
04795	<0.2	<2	NSS	<5	20	10	14	34
04796	0.2	<2	30	<5	25	13	13	34
04797	<0.2	<2	30	<5	550	16	18	60
04797*	<0.2	<2	10	<5	30	16	19	55
04798	1.3	<2	50	170	80	14	16	38
04799	0.3	<2	<5	30	185	14	16	40
04800	0.2	4	<5	<5	30	13	21	54
04826	<0.2	7	15	<5	20	17	25	52
04827	<0.2	3	<5	<5	<5	15	14	40
04828	<0.2	<2	765	<5	<5	14	19	33
04829	<0.2	2	10	<5	20	19	23	73
04830	0.3	4	15	10	45	24	31	86
04831	0.4	7	<5	NSS	40	27	28	81
04831*	0.5	4	13	NSS	35	27	29	81
04832	<0.2	<2	45	<5	5	20	26	61
04833	<0.2	<2	40	10	5	16	14	60
04834	2.5	<2	NSS	100	100	39	47	54
04835	1.6	<2	100	65	75	13	15	54

**APPENDIX 3**  
**SOIL SAMPLE ANALYTICAL RESULTS**

fors property soil geochemistry

SAMP	SMP2	AG PPM	AS PPM	AU1 PPB	CU PPM	PB PPM	ZN PPM
	PM1189	<0.2	3	30	12	12	56
FSC	A1	<0.2	2	40	22	19	105
FSC	A2	<0.2	2	30	16	20	138
FSC	A3	<0.2	2	25	18	16	87
FSC	A4	<0.2	3	<5	23	21	112
FSC	A5	<0.2	5	<5	15	14	83
FSC	A6	<0.2	<2	<5	16	14	140
FSC	A7	<0.2	<2	<5	8	9	37
FSC	A8	<0.2	6	<5	14	23	82
FSC	A9	<0.2	5	<5	14	16	60
FSC	A10	<0.2	3	<5	18	15	72
FSC	A11	<0.2	3	<5	14	11	102
FSC	A12	<0.2	<2	<5	20	14	122
FSC	B1	<0.2	3	<5	14	12	62
FSC	B2	<0.2	3	<5	16	30	192
FSC	B3	<0.2	<2	<5	12	21	118
FSC	B4	<0.2	5	<5	31	36	118
FSC	B5	0.2	5	15	17	28	142
FSC	B5*	0.3	3	10	17	28	140
FSC	B6	<0.2	10	15	16	22	112
FSC	B7	<0.2	5	15	17	27	140
FSC	B8	<0.2	2	25	10	13	103
FSC	B9	<0.2	<2	25	8	11	35
FSC	B10	<0.2	<2	25	19	18	83
FSC	B11	<0.2	4	45	10	12	84
FSC	B12	<0.2	8	30	10	11	54
FSC	C1	<0.2	11	15	19	30	136
FSC	c2	<0.2	7	<5	18	36	84
FSC	c2*	<0.2	9	15	17	36	83
FSC	C3	0.3	44	<5	23	121	234
FSC	c4	<0.2	8	<5	10	23	80
FSC	C5	0.2	39	<5	15	140	193
FSC	C6	<0.2	11	<5	15	32	73
FSC	c7	<0.2	5	<5	14	15	64
FSC	C8	<0.2	3	<5	14	17	90
FSC	C9	<0.2	7	<5	13	16	100
FSC	C10	<0.2	<2	<5	11	11	67
FSC	C11	<0.2	<2	<5	8	11	46
FSC	C11*	<0.2	<2	<5	7	10	45
FSC	c12	0.2	<2	<5	21	14	101
FSC	D1	<0.2	<2	<5	11	13	107
FSC	D2	<0.2	6	<5	13	20	146
FSC	D3	<0.2	8	<5	16	33	140
FSC	D4	0.2	22	20	11	142	185
FSC	D5	<0.2	<2	<5	16	15	120
FSC	D6	<0.2	<2	<5	18	18	83
FSC	D7	<0.2	2	10	17	15	92
FSC	D8	0.2	4	<5	19	18	82
FSC	D8*	0.2	6	5	19	18	80
FSC	D9	0.2	5	10	26	21	136
FSC	D10	0.2	<2	<5	16	12	130
FSC	D11	<0.2	3	<5	18	16	110
FSC	D12	<0.2	<2	5	19	15	128
FSC	E1	<0.2	5	<5	22	17	133
FSC	E2	<0.2	6	<5	21	12	118
FSC	E3	<0.2	3	<5	15	14	103
FSC	E4	<0.2	2	<5	13	14	104
FSC	E5	<0.2	3	<5	17	17	117
FSC	E5*	<0.2	5	<5	17	17	118
FSC	E6	<0.2	2	<5	17	16	86
FSC	E7	<0.2	4	<5	19	15	80

FSC	E8	<0.2	5	<5	11	17	42
FSC	E9	<0.2	15	<5	9	12	40
FSC	E10	<0.2	<2	<5	14	12	66
FSC	E11	<0.2	4	10	16	13	120
FSC	E12	<0.2	2	10	16	12	70
FSC	F1	<0.2	<2	10	12	14	50
FSC	F2	0.2	3	10	18	16	65
FSC	F2*	0.2	4	10	17	17	66
FSC	F3	<0.2	<2	5	13	17	68
FSC	F4	<0.2	<2	10	12	14	48
FSC	F5	<0.2	<2	<5	10	11	43
FSC	F6	<0.2	<2	<5	10	14	51
FSC	F7	<0.2	<2	10	8	16	48
FSC	F8	<0.2	<2	<5	9	15	50
FSC	F9	<0.2	<2	5	10	15	52
FSC	F10	0.2	9	<5	33	32	76
FSC	F11	<0.2	<2	15	13	16	45
FSC	F12	<0.2	<2	5	15	25	56
FSC	F13	<0.2	2	<5	14	19	58
FSC	F14	<0.2	2	<5	11	15	46
FSC	F15	<0.2	<2	<5	12	17	51
FSC	F16	<0.2	2	<5	10	13	33
FSC	F17	<0.2	<2	<5	10	19	52
FSC	F18	<0.2	3	<5	18	23	57
FSC	F19	<0.2	2	<5	12	15	48
FSC	F20	<0.2	3	<5	11	13	51
FSC	F20*	<0.2	2	<5	11	14	50
FSC	F21	<0.2	<2	<5	11	14	40
FSC	F22	<0.2	4	<5	18	19	63
FSC	F23	<0.2	<2	<5	14	12	41
FSC	F24	<0.2	<2	<5	22	23	77
FSC	F25	<0.2	<2	<5	11	12	38
FSC	G1	<0.2	<2	105	14	16	65
FSC	G2	<0.2	3	<5	14	18	92
FSC	G3	<0.2	3	<5	17	16	75
FSC	G4	<0.2	<2	<5	22	19	58
FSC	G5	<0.2	<2	<5	10	11	36
FSC	G6	<0.2	4	<5	13	18	60
FSC	G7	<0.2	3	<5	16	19	63
FSC	G8	<0.2	<2	<5	10	17	58
FSC	G9	<0.2	<2	<5	11	16	52
FSC	G10	<0.2	4	<5	17	22	97
FSC	G11	<0.2	3	<5	17	23	52
FSC	G12	<0.2	6	30	7	11	33
FSC	G13	<0.2	<2	15	8	15	43
FSC	G13*	<0.2	2	25	7	15	43
FSC	G14	<0.2	<2	5	8	11	34
FSC	G15	<0.2	3	<5	10	12	33
FSC	G16	<0.2	3	<5	9	11	30
FSC	G17	<0.2	3	<5	8	10	33
FSC	G18	<0.2	<2	<5	12	10	37
FSC	G19	<0.2	2	<5	10	11	41
FSC	G20	<0.2	<2	<5	13	14	52
FSC	G21	<0.2	2	<5	18	18	80
FSC	G22	<0.2	<2	<5	15	14	66
FSC	G22*	<0.2	2	<5	15	15	69
FSC	G23	<0.2	2	<5	9	<b>9</b>	32
FSC	G24	<0.2	<2	<5	8	9	38
FSC	G25	<0.2	2	10	10	12	36
FSC	H1	<0.2	2	<5	11	14	44
FSC	H2	<0.2	<2	25	11	14	45
FSC	H3	<0.2	2	15	11	13	40
FSC	H4	<0.2	5	30	9	11	46
FSC	H5	<0.2	4	<5	8	11	33
FSC	H6	<0.2	3	<5	8	11	38
FSC	H6*	<0.2	<2	<5	8	12	37

FSC	H7	<0.2	<2	<5	9	12	39
FSC	H8	<0.2	<2	<5	9	12	39
FSC	H9	<0.2	<2	<5	10	12	41
FSC	H10	<0.2	<2	<5	9	13	44
FSC	H11	0.3	8	<5	31	32	82
FSC	H12	<0.2	2	<5	13	23	71
FSC	H13	<0.2	2	<5	8	16	37
FSC	H14	0.2	4	<5	9	11	32
FSC	H15	<0.2	3	<5	10	13	40
FSC	H15*	<0.2	2	<5	10	13	40
FSC	H16	<0.2	<2	<5	9	10	33
FSC	H17	<0.2	<2	<5	8	11	40
FSC	H18	<0.2	3	<5	14	14	81
FSC	H19	<0.2	<2	<5	13	13	80
FSC	H20	<0.2	3	10	11	12	44
FSC	H21	<0.2	3	<5	10	12	71
FSC	H22	<0.2	<2	15	9	12	51
FSC	H23	<0.2	<2	10	12	15	63
FSC	H24	<0.2	<2	<5	13	15	59
FSC	H25	<0.2	<2	15	18	24	70
FSC	I1	<0.2	<2	<5	16	16	60
FSC	I2	<0.2	2	<5	10	13	46
FSC	I3	<0.2	3	<5	14	20	60
FSC	I4	<0.2	3	<5	17	23	72
FSC	I5	<0.2	4	<5	15	22	65
FSC	I6	<0.2	2	<5	13	19	51
FSC	I7	<0.2	<2	<5	14	20	56
FSC	I8	<0.2	<2	<5	11	20	46
FSC	I8*	<0.2	<2	<5	10	18	44
FSC	I9	<0.2	<2	<5	13	24	56
FSC	I10	<0.2	<2	<5	12	22	64
FSC	I11	<0.2	<2	<5	13	21	50
FSC	I12	<0.2	2	<5	16	21	43
FSC	I13	<0.2	4	<5	20	22	51
FSC	I14	<0.2	3	<5	12	15	64
FSC	I15	<0.2	<2	<5	9	14	52
FSC	I15*	<0.2	<2	<5	9	16	51
FSC	I16	<0.2	3	<5	10	14	45
FSC	I17	<0.2	4	<5	16	23	78
FSC	I18	<0.2	<2	<5	14	20	55
FSC	I19	<0.2	<2	<5	13	12	61
FSC	I20	<0.2	<2	5	10	15	81
FSC	I21	<0.2	<2	<5	11	13	54
FSC	I22	<0.2	<2	10	13	10	51
FSC	I23	<0.2	<2	<5	12	10	42
FSC	I24	<0.2	3	<5	11	8	36
FSC	I25	<0.2	<2	<5	14	12	48
FSC	J1	<0.2	<2	25	22	16	61
FSC	52	<0.2	<2	<5	17	18	83
FSC	J2*	<0.2	<2	<5	18	20	88
FSC	53	<0.2	2	<5	18	17	58
FSC	54	<0.2	<2	<5	13	15	70
FSC	55	<0.2	<2	<5	11	13	47
FSC	J6	<0.2	<2	<5	11	13	45
FSC	57	<0.2	4	<5	16	20	86
FSC	58	<0.2	<2	<5	11	13	43
FSC	J9	<0.2	5	<5	9	14	44
FSC	J10	<0.2	6	<5	21	32	100
FSC	J11	<0.2	<2	<5	9	14	47
FSC	J11*	<0.2	<2	<5	8	14	47
FSC	512	<0.2	3	30	11	13	43
FSC	513	<0.2	<2	<5	11	18	34
FSC	514	<0.2	3	<5	8	14	58
FSC	515	<0.2	4	<5	11	12	44
FSC	516	<0.2	<2	<5	10	13	40
FSC	517	<0.2	<2	<5	16	17	48

FSC	J18	<0.2	<2	<5	16	18	73
FSC	J19	<0.2	<2	<5	16	15	118
FSC	J20	<0.2	<2	<5	11	14	100
FSC	J20*	<0.2	<2	<5	11	14	100
FSC	J21	<0.2	<2	<5	10	12	53
FSC	J22	<0.2	<2	<5	17	17	94
FSC	523	<0.2	<2	<5	13	13	85
FSC	J24	<0.2	<2	<5	14	12	56
FSC	J25	<0.2	<2	<5	16	11	87
FSC	K1	<0.2	<2	<5	12	14	75
FSC	K2	<0.2	2	<5	19	20	120
FSC	K3	<0.2	<2	<5	14	21	80
FSC	K4	<0.2	2	<5	18	23	95
FSC	K4*	<0.2	2	<5	17	22	94
FSC	K5	<0.2	<2	10	10	15	46
FSC	K6	<0.2	3	20	18	31	100
FSC	K7	0.2	4	25	20	26	110
FSC	K8	0.3	4	10	25	30	112
FSC	K9	0.3	<2	<5	27	31	106
FSC	K11	0.2	3	<5	18	32	91
FSC	K12	<0.2	<2	<5	15	27	83
FSC	K13	0.3	<2	<5	24	33	60
FSC	K14	<0.2	<2	<5	10	15	44
FSC	K14*	<0.2	2	<5	9	15	40
FSC	K15	0.2	3	<5	23	25	77
FSC	K16	0.2	4	<5	17	25	68
FSC	K17	<0.2	<2	<5	15	21	71
FSC	K18	<0.2	<2	10	9	14	58
FSC	K20	<0.2	<2	10	12	16	102
FSC	K21	0.2	<2	<5	11	15	70
FSC	K22	<0.2	<2	10	13	13	111
FSC	K23	<0.2	2	<5	11	17	67
FSC	K24	<0.2	<2	<5	22	13	45
FSC	K24*	<0.2	<2	<5	22	12	41
FSC	K25	<0.2	<2	5	18	13	62
FSC	L1	<0.2	5	5	15	14	90
FSC	L2	<0.2	2	5	10	14	82
FSC	L3	0.2	<2	<5	11	14	68
FSC	L4	0.2	3	<5	19	17	95
FSC	L5	0.3	4	<5	18	22	100
FSC	L6	<0.2	3	<5	13	24	124
FSC	L7	<0.2	<2	<5	12	25	127
FSC	L8	0.2	<2	<5	11	16	105
FSC	L9	<0.2	2	<5	13	14	84
FSC	L10	<0.2	<2	<5	14	15	59
FSC	L11	0.2	<2	10	23	27	108
FSC	L12	0.3	<2	<5	27	42	97
FSC	L13	0.2	<2	<5	17	25	71
FSC	L14	0.2	<2	<5	10	21	45
FSC	L15	0.2	<2	<5	25	25	60
FSC	L16	0.2	<2	<5	24	26	71
FSC	L17	0.6	<2	<5	27	27	124
FSC	L17*	0.5	<2	<5	29	29	128
FSC	L18	0.3	3	<5	18	26	124
FSC	L19	<0.2	<2	5	10	15	66
FSC	L20	0.2	<2	<5	9	22	122
FSC	L21	0.3	<2	<5	9	13	86
FSC	L22	0.2	<2	<5	11	11	105
FSC	L23	0.3	2	<5	11	22	76
FSC	L24	0.2	<2	<5	20	18	75
FSC	L25	0.2	3	<5	12	15	56
FSC	M1	0.3	<2	<5	16	14	96
FSC	M2	<0.2	<2	<5	14	17	87
FSC	M3	<0.2	<2	<5	7	15	103
FSC	M4	0.2	<2	<5	9	15	92
FSC	M5	<0.2	<2	<5	11	17	101

FSC	M6	<0.2	<2	<5	10	18	90
FSC	M7	<0.2	2	<5	12	17	102
FSC	M8	<0.2	<2	<5	12	19	110
FSC	M9	0.2	<2	<5	15	17	104
FSC	M10	<0.2	2	10	13	25	77
FSC	M10*	<0.2	<2	<5	13	26	80
FSC	M11	<0.2	<2	<5	15	30	100
FSC	M12	<0.2	<2	<5	13	20	80
FSC	M13	<0.2	<2	<5	13	18	50
FSC	M14	<0.2	<2	<5	12	16	53
FSC	M15	<0.2	<2	<5	12	14	70
FSC	M16	<0.2	<2	<5	12	15	60
FSC	M17	0.2	<2	<5	30	27	76
FSC	M18	0.2	3	<5	23	32	80
FSC	M19	0.2	<2	<5	30	31	105
FSC	M19*	0.2	<2	<5	29	30	103
FSC	M20	<0.2	3	<5	10	12	50
FSC	M21	<0.2	5	<5	8	14	66
FSC	M22	<0.2	4	<5	11	13	6%
FSC	M23	<0.2	<2	<5	13	11	75
FSC	M24	<0.2	5	<5	9	14	74
FSC	M25	<0.2	2	<5	14	13	54
FSC	N1	<0.2	5	<5	15	13	86
FSC	N2	<0.2	4	<5	12	17	113
FSC	N3	<0.2	<2	<5	14	16	157
FSC	N3*	<0.2	<2	<5	14	16	160
FSC	N4	<0.2	3	<5	13	16	60
FSC	N5	0.2	2	<5	12	15	74
FSC	N6	<0.2	3	<5	15	16	60
FSC	N7	<0.2	2	<5	13	16	113
FSC	N8	0.2	3	<5	15	19	66
FSC	N9	0.3	<2	<5	12	18	81
FSC	N10	0.2	3	50	19	17	93
FSC	N11	<0.2	<2	<5	17	16	86
FSC	N12	0.2	<2	<5	22	27	142
FSC	N12*	0.2	<2	<5	22	24	112
FSC	N13	<0.2	4	<5	19	18	64
FSC	N14	0.2	4	<5	30	29	74
FSC	N15	0.2	2	5	24	25	58
FSC	N16	0.3	<2	<5	17	30	112
FSC	N17	0.4	3	<5	24	25	66
FSC	N18	0.4	4	<5	32	31	82
FSC	N19	0.3	<2	<5	22	26	96
FSC	N20	0.2	<2	40	12	17	85
FSC	N21	0.2	<2	25	13	16	137
FSC	N22	0.2	2	<5	14	13	64
FSC	N23	0.3	<2	<5	12	14	101
FSC	N24	<0.2	<2	<5	8	14	61
FSC	N25	0.2	7	<5	12	18	60
FSC	01	0.2	<2	<5	11	15	72
FSC	02	<0.2	3	<5	27	22	100
FSC	03	<0.2	2	<5	16	37	92
FSC	04	0.2	10	<5	20	21	114
FSC	05	0.2	<2	<5	28	20	98
FSC	05*	0.2	<2	<5	26	18	92
FSC	06	<0.2	2	<5	17	22	105
FSC	07	<0.2	<2	<5	13	18	95
FSC	08	<0.2	3	<5	13	15	92
FSC	09	<0.2	<2	<5	13	14	100
FSC	010	<0.2	2	<5	12	13	97
FSC	011	<0.2	2	<5	19	18	100
FSC	012	<0.2	<2	<5	12	18	115
FSC	013	<0.2	<2	10	11	18	65
FSC	014	<0.2	<2	20	16	28	74
FSC	015	<0.2	<2	<5	17	18	86
FSC	016	<0.2	<2	<5	11	12	70



FSC	017	<0.2	<2	<5	11	14	68
FSC	018	<0.2	<2	<5	10	15	60
FSC	019	0.2	<2	<5	27	23	115
FSC	020	<0.2	<2	<5	12	20	77
FSC	021	<0.2	<2	<5	8	9	38
FSC	022	<0.2	<2	<5	12	12	54
FSC	023	0.2	<2	<5	9	15	71
FSC	023*	0.2	<2	<5	9	13	72
FSC	024	<0.2	<2	<5	13	11	65
FSC	025	<0.2	<2	<5	9	9	56
FSC	P1	0.2	<2	<5	10	15	47
FSC	P1*	0.2	<2	<5	9	16	48
FSC	P2	<0.2	<2	<5	22	18	53
FSC	P3	<0.2	<2	<5	24	11	32
FSC	P4	<0.2	<2	20	11	13	34
FSC	P5	<0.2	5	<5	32	24	74
FSC	P6	<0.2	<2	5	16	17	40
FSC	P7	0.3	<2	5	65	26	41
FSC	P8	0.2	<2	<5	12	15	70
FSC	P9	<0.2	<2	<5	15	16	37
FSC	P10	<0.2	<2	<5	14	15	44
FSC	P10*	<0.2	<2	<5	13	16	41
FSC	P11	<0.2	<2	<5	11	15	37
FSC	P12	0.7	2	<5	60	40	55
FSC	Q1	<0.2	<2	<5	20	40	136
FSC	Q2	0.2	3	<5	18	20	90
FSC	Q3	0.2	<2	<5	32	34	120
FSC	Q4	<0.2	<2	<5	20	26	71
FSC	Q5	0.2	2	<5	24	68	60
FSC	Q6	<0.2	<2	<5	20	20	58
FSC	Q7	<0.2	<2	<5	15	14	28
FSC	Q8	0.2	<2	<5	19	22	66
FSC	Q9	0.5	<2	<5	27	26	60
FSC	Q10	<0.2	2	<5	20	20	70
FSC	Q11	0.4	<2	<5	23	16	63
FSC	Q12	0.3	2	<5	32	17	66
FSC	R1	0.2	3	<5	16	39	97
FSC	R2	<0.2	2	<5	12	22	48
FSC	R3	0.4	3	<5	21	33	80
FSC	R4	0.3	4	<5	30	37	128
FSC	R4*	0.2	5	<5	29	35	128
FSC	R5	<0.2	3	<5	15	18	32
FSC	R6	0.2	15	<5	29	18	48
FSC	R7	0.3	2	<5	23	22	84
FSC	R8	0.2	4	<5	23	13	67
FSC	R9	<0.2	<2	<5	17	12	37
FSC	R10	<0.2	3	<5	21	18	148
FSC	R11	<0.2	3	<5	30	36	90
FSC	R12	0.2	<2	<5	22	20	55
FSC	S1	<0.2	5	<5	32	27	102
FSC	S1*	<0.2	3	<5	33	26	107
FSC	s2	<0.2	3	<5	30	25	78
FSC	s3	<0.2	2	<5	64	14	56
FSC	s4	0.2	3	<5	45	16	74
FSC	s5	<0.2	<2	<5	34	20	41
FSC	S6	0.2	<2	<5	40	19	41
FSC	s7	1.1	<2	<5	40	10	72
FSC	S8	0.2	<2	<5	94	12	83
FSC	S9	<0.2	2	<5	22	19	57
FSC	S10	0.3	<2	<5	25	20	86
FSC	S10*	0.3	3	<5	25	20	86
FSC	S11	0.3	3	<5	17	14	96
FSC	s12	<0.2	2	<5	15	17	48
FSC	T1	<0.2	3	<5	62	14	68
FSC	T2	<0.2	5	<5	38	20	78
FSC	T3	<0.2	2	<5	28	15	61

FSC	T4	<0.2	2	<5	15	14	25
FSC	T5	<0.2	6	<5	31	17	50
FSC	T6	<0.2	5	<5	17	13	37
FSC	T7	<0.2	<2	<5	12	12	23
FSC	T7*	<0.2	3	<5	11	12	22
FSC	T8	0.6	2	<5	78	32	79
FSC	T9	<0.2	3	<5	15	16	35
FSC	T10	0.5	3	<5	38	32	82
FSC	T11	<0.2	<2	<5	21	12	39
FSC	T12	0.4	5	<5	50	28	120
FSC	U1	0.2	4	<5	70	16	117
FSC	u2	0.2	<2	<5	40	20	53
FSC	u3	0.2	<2	<5	38	18	43
FSC	u4	<0.2	<2	<5	10	14	23
FSC	u5	<0.2	2	<5	12	16	26
FSC	U6	<0.2	4	<5	26	21	42
FSC	u7	0.2	<2	<5	20	20	74
FSC	U8	<0.2	<2	<5	20	16	38
FSC	U9	0.5	<2	5	65	16	55
FSC	U10	0.4	<2	<5	31	14	120
FSC	U11	0.2	<2	<5	18	13	41
FSC	u12	0.2	3	<5	27	21	100
FSC	V1	<0.2	3	<5	35	14	50
FSC	v2	0.3	<2	<5	42	22	62
FSC	v3	0.2	<2	<5	30	13	55
FSC	v4	0.6	2	<5	18	21	83
FSC	v5	<0.2	<2	<5	17	13	44
FSC	V6	<0.2	2	<5	22	16	42
FSC	v7	<0.2	<2	<5	21	28	100
FSC	V8	0.2	4	<5	27	18	68
FSC	V9	<0.2	<2	<5	29	17	58
FSC	V10	0.2	2	<5	25	21	62
FSC	V10*	0.3	3	<5	25	21	62
FSC	V11	0.2	2	<5	27	17	63
FSC	v12	<0.2	2	<5	18	16	43
FSC	W1	<0.2	3	10	14	16	135
FSC	w2	0.3	2	5	14	23	108
FSC	w3	0.2	9	<5	23	21	242
FSC	w4	<0.2	10	<5	21	49	162
FSC	w5	0.3	26	<5	29	82	126
FSC	W6	0.3	44	<5	28	120	217
FSC	w7	0.3	53	<5	46	116	148
FSC	w7*	0.4	50	<5	47	118	150
FSC	W8	<0.2	17	10	16	43	143
FSC	W9	0.2	8	<5	15	18	266
FSC	W10	<0.2	6	<5	26	23	156
FSC	W11	<0.2	5	<5	23	21	100
FSC	w12	<0.2	5	<5	30	31	143
FSC	W13	0.2	4	<5	20	35	166
FSC	W14	0.2	6	<5	24	23	94
FSC	W15	<0.2	3	<5	14	25	160
FSC	W16	<0.2	5	<5	14	20	102
FSC	W16*	<0.2	6	<5	14	20	100
FSC	W17	<0.2	2	<5	14	18	89
FSC	W18	<0.2	5	<5	22	20	56
FSC	W19	<0.2	2	<5	11	15	61
FSC	w20	<0.2	4	<5	13	17	95
FSC	X1	<0.2	12	<5	28	30	250
FSC	x2	0.2	24	<5	18	83	235
FSC	x3	<0.2	13	<5	28	33	116
FSC	x4	<0.2	28	<5	27	62	97
FSC	x5	<0.2	13	<5	19	22	110
FSC	x5*	<0.2	10	<5	18	22	110
FSC	X6	<0.2	<2	<5	25	26	120
FSC	X7	<0.2	5	<5	28	21	108
FSC	X8	<0.2	3	<5	27	17	103

FSC	X9	<0.2	4	<5	19	16	72
FSC	X10	<0.2	2	<5	20	18	98
FSC	X11	<0.2	4	<5	18	19	125
FSC	X12	0.2	6	<5	36	32	90
FSC	X13	<0.2	<2	<5	16	17	96
FSC	X14	<0.2	2	<5	19	18	85
FSC	X15	<0.2	<2	<5	11	17	163
FSC	X16	<0.2	<2	<5	10	13	82
FSC	X17	<0.2	<2	<5	6	12	52
FSC	X18	<0.2	<2	<5	13	18	40
FSC	X19	<0.2	<2	<5	6	13	76
FSC	X20	<0.2	<2	<5	6	13	54
FSC	Y1	<0.2	3	<5	18	14	110
FSC	Y2	<0.2	9	<5	29	20	123
FSC	Y3	<0.2	3	<5	25	24	90
FSC	Y3*	<0.2	3	<5	24	24	85
FSC	Y4	<0.2	<2	<5	15	20	93
FSC	Y5	<0.2	<2	<5	15	21	73
FSC	Y6	<0.2	<2	<5	17	25	75
FSC	Y7	<0.2	20	<5	30	47	138
FSC	Y8	<0.2	35	<5	27	90	148
FSC	Y9	<0.2	46	<5	24	88	157
FSC	Y10	<0.2	41	<5	24	87	232
FSC	Y11	0.9	160	<5	40	260	220
FSC	Y12	<0.2	42	<5	17	108	250
FSC	Y12*	<0.2	43	<5	16	105	248
FSC	Y13	0.2	38	<5	38	78	127
FSC	Y14	<0.2	40	<5	40	44	133
FSC	Y15	<0.2	17	<5	34	38	106
FSC	Y16	<0.2	11	<5	21	21	104
FSC	Y17	<0.2	15	<5	36	35	150
FSC	Y18	<0.2	15	<5	22	53	184
FSC	Y19	<0.2	19	<5	24	36	174
FSC	Y20	<0.2	7	<5	23	30	105
FSC	Z1	<0.2	5	<5	28	20	124
FSC	Z1*	<0.2	7	<5	29	20	128
FSC	Z2	<0.2	4	<5	18	19	117
FSC	Z3	<0.2	3	<5	13	17	140
FSC	Z4	<0.2	5	<5	19	20	87
FSC	Z5	<0.2	8	<5	32	19	91
FSC	Z6	<0.2	6	<5	22	15	83
FSC	Z7	<0.2	3	<5	25	17	83
FSC	Z8	<0.2	7	5	28	18	84
FSC	Z9	<0.2	5	15	24	20	93
FSC	Z10	<0.2	7	<5	29	25	110
FSC	Z10*	<0.2	9	<5	31	28	118
FSC	Z11	<0.2	22	<5	34	50	132
FSC	Z12	<0.2	39	<5	30	26	234
FSC	Z13	<0.2	52	15	10	230	430
FSC	Z14	0.3	27	10	9	325	900
FSC	Z15	0.6	46	5	32	320	760
FSC	Z16	0.4	15	<5	56	145	540
FSC	Z17	2.7	62	<5	40	660	430
FSC	Z18	0.5	31	<5	21	88	540
FSC	Z19	0.4	32	<5	37	155	360
FSC	Z20	0.6	69	<5	25	230	400
FSC	Z20*	0.6	74	<5	26	240	410
FSC	AA1	0.2	<2	<5	26	18	135
FSC	AA2	0.3	<2	<5	21	20	100
FSC	AA3	0.3	4	<5	30	16	138
FSC	AA4	0.2	7	<5	25	18	100
FSC	AA5	0.2	13	<5	26	14	81
FSC	AA6	0.2	18	<5	31	15	95
FSC	AA7	0.2	32	<5	22	13	136
FSC	AA8	0.3	28	<5	28	16	95
FSC	AA9	0.3	20	<5	24	20	110

FSC	AA10	0.2	36	<5	26	14	106
FSC	AA11	0.3	11	<5	40	28	134
FSC	AA12	1.1	97	100	69	550	740
FSC	AA13	0.4	8	5	25	66	960
FSC	AA14	0.3	13	5	32	43	510
FSC	AA15	0.6	7	<5	47	82	295
FSC	AA16	0.4	8	10	44	78	281
FSC	AA17	0.5	14	<5	37	203	367
FSC	AA18	0.6	11	<5	56	123	325
FSC	AA18*	0.7	9	<5	52	117	320
FSC	AA19	0.2	6	<5	44	36	328
FSC	AA20	0.4	7	<5	44	30	310
FSC	BB1	0.2	15	<5	45	24	144
FSC	BB2	0.3	19	<5	41	20	178
FSC	BB3	0.3	27	<5	51	22	208
FSC	BB4	0.3	42	<5	27	21	222
FSC	BB5	0.3	21	<5	44	21	147
FSC	BB6	0.3	15	<5	43	20	143
FSC	BB7	<0.2	6	<5	31	16	70
FSC	BB7*	0.3	3	NSS	35	15	75
FSC	BB8	<0.2	18	<5	35	14	76
FSC	BB9	0.3	4	<5	27	24	97
FSC	BB10	<0.2	5	5	30	28	146
FSC	BB11	<0.2	6	10	27	30	128
FSC	BB12	<0.2	6	10	16	13	352
FSC	BB13	<0.2	2	15	15	25	250
FSC	BB14	0.2	7	<5	23	21	100
FSC	BB15	<0.2	<2	<5	14	12	70
FSC	BB16	0.3	7	<5	20	13	245
FSC	BB16*	0.2	6	5	20	14	244
FSC	BB17	<0.2	15	<5	22	21	390
FSC	BB18	<0.2	5	<5	23	30	490
FSC	BB19	<0.2	13	<5	27	24	330
FSC	BB20	<0.2	7	<5	22	17	314
FSC	CC1	0.2	12	<5	42	18	205
FSC	cc2	<0.2	40	<5	45	18	166
FSC	cc3	<0.2	8	<5	25	15	187
FSC	cc4	<0.2	31	<5	40	22	295
FSC	cc5	<0.2	11	<5	43	18	520
FSC	CC5*	<0.2	11	NSS	47	19	530
FSC	CC6	<0.2	8	<5	45	18	214
FSC	CC7	0.3	7	<5	30	18	223
FSC	CC8	0.3	12	5	47	28	125
FSC	CC9	0.2	8	10	38	21	128
FSC	CC10	<0.2	4	10	27	16	87
FSC	CC11	0.2	4	<5	23	17	79
FSC	cc12	0.2	3	<5	19	20	133
FSC	CC13	<0.2	4	<5	20	25	168
FSC	CC14	0.3	4	5	21	122	178
FSC	CC15	<0.2	4	5	25	72	222
FSC	CC16	0.2	4	<5	26	26	155
FSC	CC17	<0.2	3	<5	20	35	220
FSC	CC18	0.5	3	<5	20	77	320
FSC	CC19	0.2	4	<5	13	11	220
FSC	cc20	<0.2	4	<5	13	12	265
FSC	DD1	0.2	10	<5	26	35	560
FSC	DD2	<0.2	8	<5	28	24	370
FSC	DD3	0.2	3	<5	20	15	480
FSC	DD3*	0.2	3	NSS	20	15	480
FSC	DD4	0.2	2	<5	20	18	237
FSC	DD5	0.2	5	<5	26	21	256
FSC	DD6	0.4	<2	10	17	14	220
FSC	DD7	0.2	12	15	13	9	262
FSC	DD8	0.2	<2	5	34	26	264
FSC	DD9	0.2	<2	<5	32	17	238
FSC	DD10	0.2	3	<5	22	17	150

FSC	DD11	0.2	<2	<5	19	31	176
FSC	DD12	0.3	4	<5	19	43	185
FSC	DD12*	0.4	4	<5	18	40	180
FSC	DD13	0.2	6	<5	32	28	170
FSC	DD14	0.4	<2	<5	21	70	830
FSC	DD15	0.2	3	5	30	30	303
FSC	DD16	0.2	<2	<5	20	26	235
FSC	DD17	0.3	<2	<5	17	23	294
FSC	DD18	0.4	4	<5	18	15	320
FSC	DD19	0.4	<2	<5	15	24	240
FSC	DD20	0.3	<2	<5	13	17	218

**APPENDIX 4**  
**ROCK SAMPLE ANALYTICAL RESULTS**

f'ors property rock geochemistry

<i>SAMP</i>	<i>AG</i> PPM	<i>AS</i> PPM	<i>AU I</i> PPB	<i>CU</i> PPM	<i>PB</i> PPM	<i>SB</i> PPM	<i>ZN</i> PPM
53051	0.2	<2	<5	114	34		22
53051*	0.3	<2	<5	115	33		21
53052	<0.2	<2	<5	10	12		25
53053	<0.2	<2	<5	26	5		40
53054	<0.2	<2	<5	4	13		132
53055	<0.2	<2	<5	12	7		28
53056	4.2	50	<5	680	0.58%		62
53057	0.4	2	<5	105	190		33
53058	<0.2	14	<5	33	12		18
53059	0.6	370	<5	65	44		8
53059*	0.5	360	<5	65	43		7
53060	<0.2	3	<5	32	19		46
53061	<0.2	2	<5	6	8		22
53062	<0.2	<2	<5	154	16		2
53063	<0.2	<2	<5	520	12		8
53064	<0.2	6	<5	314	6		58
53065	<0.2	8	<5	6	10		60
53066	<0.2	6	<5	63	9		62
53067	<0.2	<2	<5	35	15		77
53068	0.9	28	<5	960	7		51
53069	<0.2	5	<5	36	5		2
53070	0.9	2	<5	64	5		<2
53071	0.4	11	<5	500	7		8
53071*	0.4	10	<5	500	7		8
53072	<0.2	2	<5	6	19		19
53073	<0.2	<2	5	18	23		37
53074	<0.2	<2	<5	15	42		19
53075	<0.2	3	<5	17	29		32
53076	<0.2	<2	<5	16	21		25
53077	<0.2	5	<5	20	58		40
53078	<0.2	15	10	13	20		24
53079	<0.2	3	10	6	10		15
53080	<0.2	<2	<5	18	34		57
53080*	<0.2	<2	5	19	36		57
53081	<0.2	12	<5	15	9		100
53082	<0.2	11	<5	50	13		4
53083	<0.2	<2	<5	11	18		5
53084	<0.2	17	<5	100	43		5
53085	<0.2	67	<5	70	48		3
53086	<0.2	<2	10	33	33		81
53087	<0.2	<2	10	11	28		30
53088	0.3	10	<5	520	61		80
53089	0.2	<2	<5	32	28		90
53090	0.9	<2	<5	37	270		203
53091	8.0	42	<5	26	1760	3	039%
53092	<0.2	<2	<5	19	13	8	67
53093	<0.2	<2	<5	19	14	10	75
53094	<0.2	7	<5	12	28	17	54
53095	25	55	<5	104	0.44%	123	0.98%
53096	6.0	0.17%	25	66	0.44%	0.37%	640
53096*	6.0	0.16%	30	68	0.44%	0.36%	640
53126	<0.2	14	<5	26	12		30
53127	<0.2	<2	<5	36	56		136
53128	0.3	<2	<5	41	130		227
53129	<0.2	<2	<5	40	35		15
53130	0.5	<2	<5	40	172		284
53131	<0.2	<2	<5	41	8		34
53132	<0.2	<2	<5	46	23		36
53133	<0.2	<2	<5	31	6		33
53134	<0.2	17	<5	30	14		44
53135	<0.2	6	<5	25	7		15

53136	<0.2	<2	<5	9	4		4
53137	<0.2	6	<5	6	6		3
53138	<0.2	<2	<5	45	13		7
53139	<0.2	8	<5	12	4		7
53140	<0.2	<2	<5	32	37		58
53141	<0.2	2	15	21	52		38
53142	<0.2	<2	<5	17	24		12
53143	1.1	2	25	620	8		39
53144	0.2	<2	<5	520	5		40
53144*	0.3	2	<5	520	4		40
53145	<0.2	<2	10	17	6	<2	10
53146	<0.2	10	10	22	38	2	70
53152	<0.2	<2	<5	10	31	<2	41
53158	0.8	40	10	4	305	2	15
53159	0.7	80	75	25	205	7	2100
53160	15	0.90%	35	43	0.41%	380	0.90%
53161	31	0.55%	45	9	0.54%	360	72
53162	128	460	60	91	0.82%	0.37%	0.86%
53163	130	0.36%	75	120	4.20%	240	7.10%
53163*	130	0.37%	75	118	4.20%	240	7.10%
53164	23	630	20	18	0.55%	81	173
53165	19	490	70	49	1430	1.45%	0.36%
53166	0.3	3	<5	17	43	53	16
53173	0.3	5	5	18	46	86	57
66726	<0.2	<2	5	3	8		7
66727	0.5	15	<5	13	60		116
66728	<0.2	8	25	47	7		18
66729	<0.2	5	20	109	9		43
66730	<0.2	8	<5	22	13		21
66731	<0.2	5	15	23	6		50
66732	0.3	3	10	34	134		243
66733	<0.2	6	20	37	10		46
66734	<0.2	8	15	97	50		38
66734*	<0.2	10	25	98	50		36
66735	<0.2	2	<5	10	16		77
66736	<0.2	<2	<5	18	6		37
66737	<0.2	5	<5	23	10		54
66738	<0.2	10	<5	13	5		20
66739	<0.2	8	<5	12	8		32
66740	<0.2	4	10	11	7		36
66741	<0.2	23	<5	8	5		21
66742	<0.2	80	<5	11	6		20
66743	<0.2	4	<5	38	7		67
66743*	<0.2	2	<5	38	8		66
66744	2.3	410	<5	57	2010		1060
66745	<0.2	8	<5	16	29		11
66746	120	190	15	126	0.95%		0.77%
66747	<0.2	3	<5	386	10		26
66748	<0.2	<2	<5	37	21		84
66749	<0.2	<2	<5	44	8		12
66750	<0.2	9	<5	34	24		135
76019	<0.2	4	60	11	71		65
76020	0.3	3	30	17	90		970
76021	<0.2	<2	10	20	36		152
76022	1.5	<2	20	46	236		0.40%
76023	<0.2	<2	<5	12	14		94
76024	<0.2	3	<5	3	4		57
76024*	<0.2	2	15	3	4		57
76025	<0.2	5	<5	5	7		51



## **APPENDIX 5**

### **ANALYTICAL EXTRACTION AND DETECTION TECHNIQUES**

**Analytical Extraction and Detection Techniques in Use  
at the Placer Dome Inc. Vancouver Geochemical Laboratory**

<b><u>Element</u></b>	<b><u>Unit</u></b>	<b><u>Weight {Grams}</u></b>	<b><u>Digestion</u></b>	<b><u>Detection Limit</u></b>	<b><u>Instrumentation</u></b>
<b>c u</b>	<b>ppm</b>	<b>0.5</b>	<b>HC104/HN03 4 Hrs</b>	<b>2-4000</b>	<b>Atomic Absorption</b>
<b>Zn</b>	<b>ppm</b>	<b>0.5</b>	<b>HC104/HN03 4 Hrs</b>	<b>2-3000</b>	<b>Atomic Absorption</b>
<b>Pb</b>	<b>ppm</b>	<b>0.5</b>	<b>HC104/HN03 4 Hrs</b>	<b>2-3000</b>	<b>A.A. Background Cor.</b>
<b>Ag</b>	<b>ppm</b>	<b>0.5</b>	<b>HC104/HN03 4 Hrs</b>	<b>0.2-20</b>	<b>A.A. Background Cor.</b>
<b>Au1</b>	<b>ppb</b>	<b>10.0</b>	<b>Aqua Regia 3 Hrs</b>	<b>5-4000</b>	<b>A.A. Solvent Extract</b>
<b>As</b>	<b>ppm</b>	<b>0.5</b>	<b>Aqua Regia 3 Hrs</b>	<b>2-2000</b>	<b>DC Plasma</b>
<b>Mo</b>	<b>ppm</b>	<b>0.5</b>	<b>HC104/HN03 4 Hrs</b>	<b>1-1000</b>	<b>Atomic Absorption</b>



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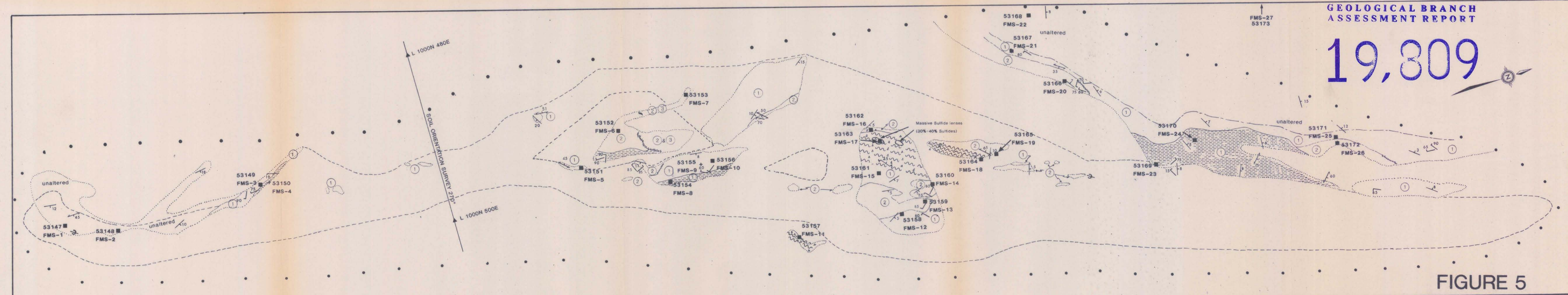
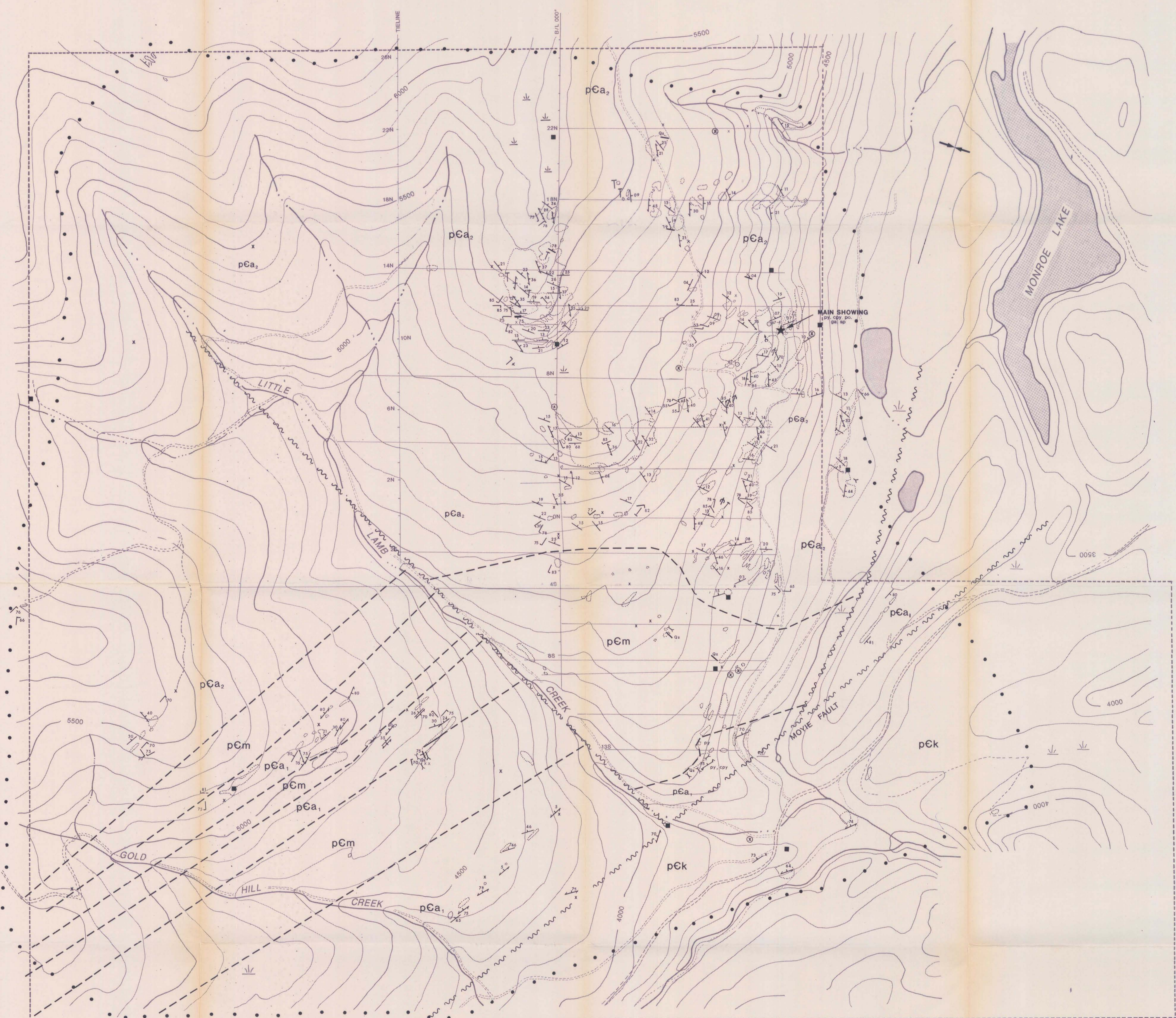


FIGURE 5

<p><b>LITHOLOGY</b></p> <p>MIDDLE ALDRIDGE FORMATION</p> <p>feldspar quartz arenite</p> <p>argillite</p>		<p><b>ALTERATION</b></p> <p>① sericitization/argillization</p> <p>② sulphidization; commonly pyrite and pyrrhotite</p> <p>③ silicification</p>		<p><b>MAP SYMBOLS</b></p> <p>--- BOUNDARY OF DISTURBED GROUND/TRENCH</p> <p>... LIMIT OF GEOLOGIC MAPPING</p> <p>— GEOLOGICAL CONTACT</p> <p>--- ALTERATION BOUNDARY</p> <p>○ AREA OF OUTCROP</p> <p>→ GLACIAL STRIAE</p> <p>↘ JOINT; DIP</p> <p>↘ PENETRATIVE FABRIC; CLEAVAGE SHOWING DIP</p> <p>↘ BEDDING SHOWING DIP</p>		<p>53156 FORS MAIN SHOWING GRAB SAMPLE LOCATION AND NUMBER</p> <p>↘ SHEAR PLANE ORIENTATION</p> <p>~ SHEAR/FAULT TRACE</p> <p>△ BRECCIATION</p>		<p>0 10 20 METERS</p> <p>GEOLOGY BY PIERRE MAHEUX</p>		<p>PLACER DOME INC.</p> <p>DRAWN BY: FORS PROPERTY</p> <p>DATE: dec. 89</p> <p>SCALE: 1:200</p> <p>REVISED:</p> <p>FILE No. 82G/5</p>	
--	--	--	--	--	--	---	--	---	--	---	--





**GEOLOGICAL LEGEND**

- pCm MOYLE INTRUSIVES; gabbro sills/dykes?
- pCk KITCHENER FORMATION; dolomitic siltstone and other carbonate rocks
- pCa<sub>2</sub> MIDDLE ALDRIDGE; quartz arenite, feldspar quartz arenites, feldspar biotite quartz arenite, greywacke and argillite intercalations.
- pCa<sub>1</sub> LOWER ALDRIDGE; irregularly bedded siltstone, argillite, quartzite.

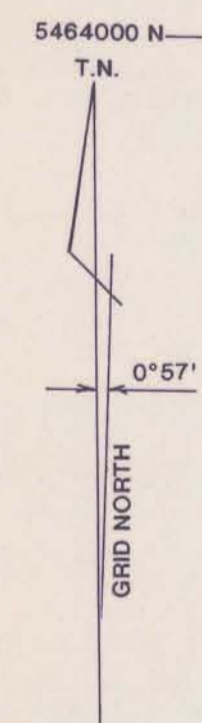
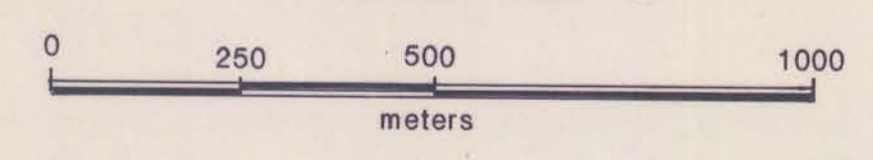
**MAP SYMBOLS**

- AREA OF OUTCROP
- x OUTCROP
- ⊙ FLOAT
- CLAIMPOST
- <sup>27</sup> DIAMOND DRILL HOLE SITE
- ↖ SHEAR
- ↖ FOLIATION
- ↖ BEDDING
- ↖ JOINT
- ↖ GLACIAL STRIAE
- ↖ QUARTZ VEIN (DIP)
- ↖ MINOR FOLD AXIS (VERGENCE)
- ↖ FOLD AXIAL TRACE, SYNCLINE
- ↖ GEOLOGIC CONTACT (APPROXIMATE, ASSUMED)
- ↖ FAULT
- ↖ TRENCH
- ↖ ADIT, TUNNEL
- ↖ ROAD
- ↖ TRAIL
- LIMIT OF GEOLOGICAL INTERPRETATION
- CONTOUR INTERVAL = 100 FEET

CLAIM BOUNDARY (Claim posts and boundary located by chain and compass survey)

- py PYRITE OCCURRENCE
- cpy CHALCOPYRITE OCCURRENCE
- ga GALENA OCCURRENCE
- sp SPHALERITE OCCURRENCE
- po PYRRHOTITE OCCURRENCE

**FIGURE 3**



DETAILED GEOLOGY BY PIERRE J. MAHEUX

<b>PLACER DOME INC.</b>	
<b>FORS PROPERTY</b>	
DRAWN H.R.G.	<b>GEOLOGY</b>
DATE DEC. 1989	
SCALE 1 : 10,000	FILE No. 82G/5
REVISED	





CLAIM BOUNDARY

LEGEND

- △ 53066 FLOAT SAMPLE SITE  
SAMPLE NUMBER
- ▲ 53065 ROCK OUTCROP SAMPLE SITE  
SAMPLE NUMBER

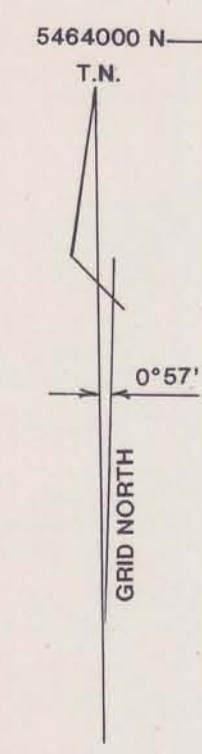
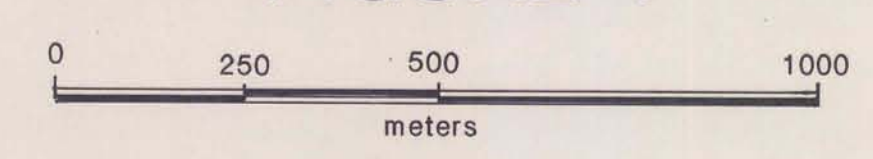
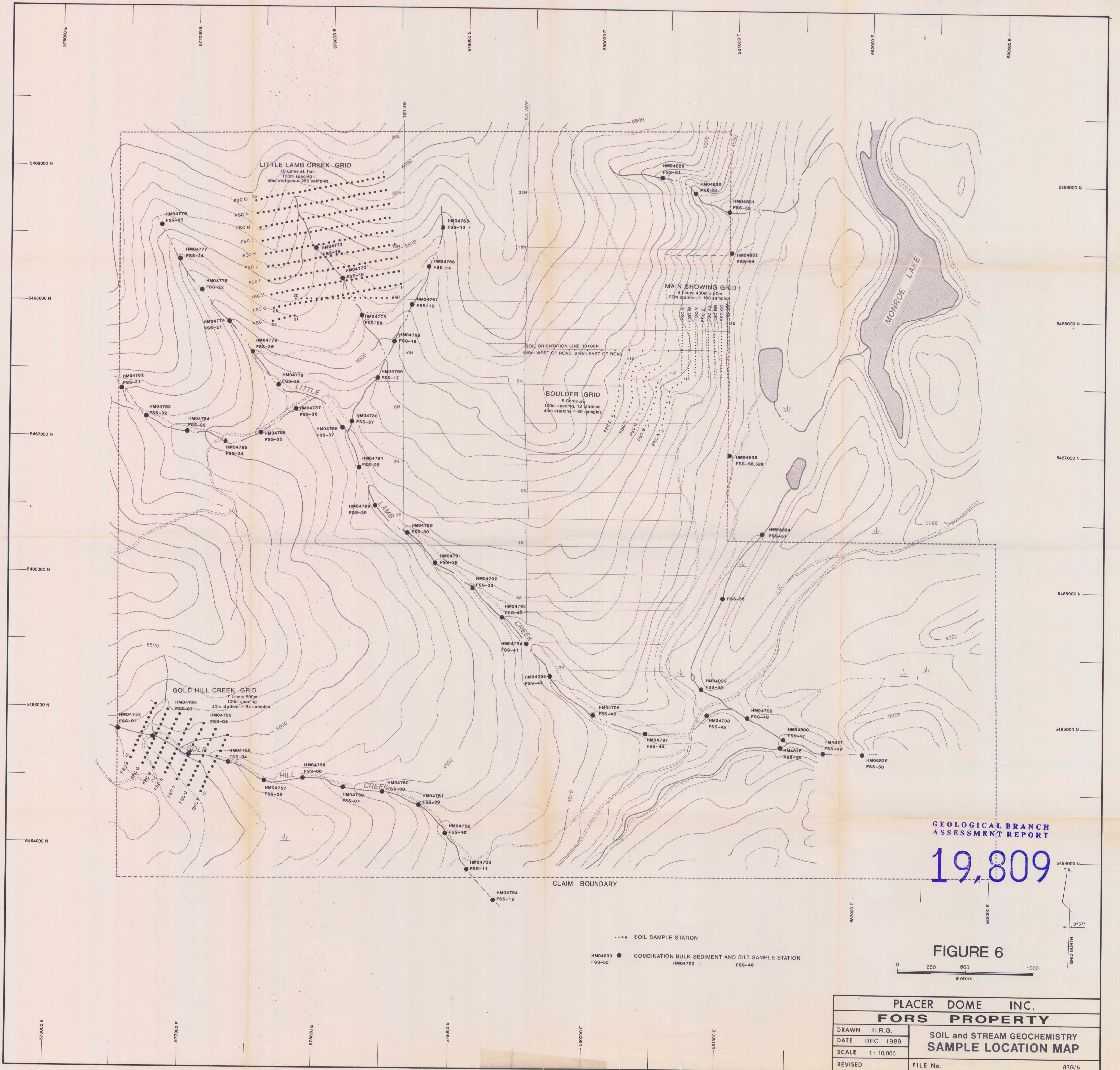


FIGURE 4

PLACER DOME INC.	
FORS PROPERTY	
DRAWN H.R.G.	ROCK SAMPLE LOCATION MAP
DATE DEC. 1989	
SCALE 1:10,000	
REVISED	
FILE No.	82G/5

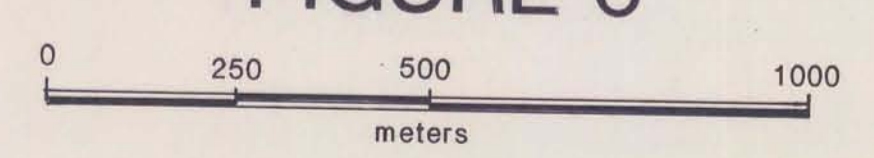




GEOLOGICAL BRANCH  
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FIGURE 6



- SOIL SAMPLE STATION
- COMBINATION BULK SEDIMENT AND SILT SAMPLE STATION

<b>PLACER DOME INC.</b>	
<b>FORS PROPERTY</b>	
DRAWN H.R.G.	<b>SOIL and STREAM GEOCHEMISTRY SAMPLE LOCATION MAP</b>
DATE DEC. 1989	
SCALE 1 : 10,000	
REVISED	
FILE No.	82G/5



FORS PROPERTY  
MAIN SHOWING SOIL GRID  
ZINC IN PPM

LEGEND

- <200 PPM ZINC
- 200 - 499
- >500 PPM ZINC



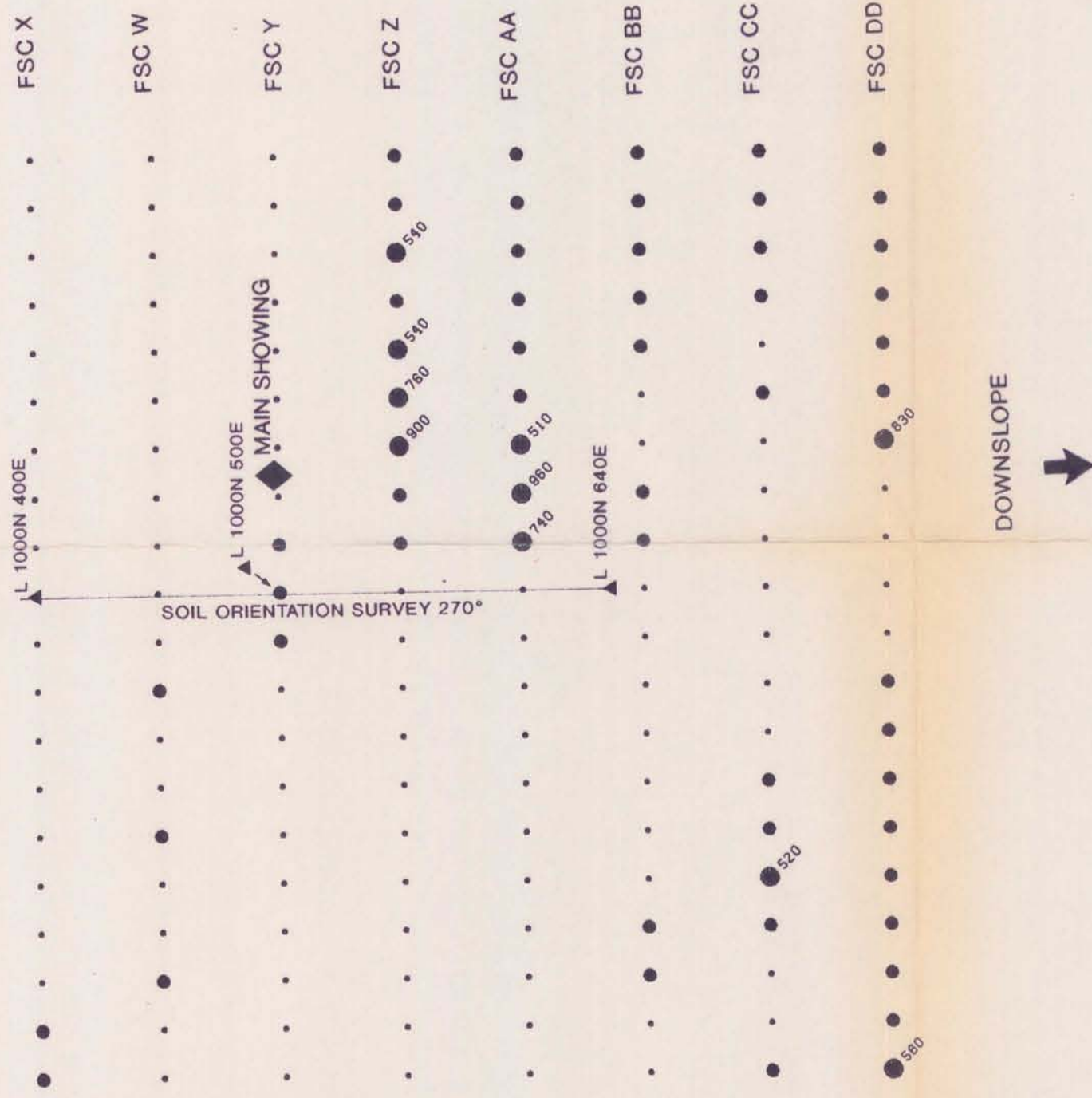
DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/MAINSHOW

FIELD FILE  
POINTS: ZN LOCASY  
POINTS: ZN LOCASY



Figure 7a

DRAWN MG		PLACER DOME INC.	
DATE 90:01:25		FORS PROPERTY	
SCALE 1:2500		MAIN SHOWING SOIL GRID	
		ZINC IN PPM	
		NO.	PLATE



FORS PROPERTY  
MAIN SHOWING SOIL GRID  
LEAD IN PPM

LEGEND

- <30 PPM LEAD
- 30 - 59
- 60 - 99
- 100 - 299
- >300 PPM LEAD



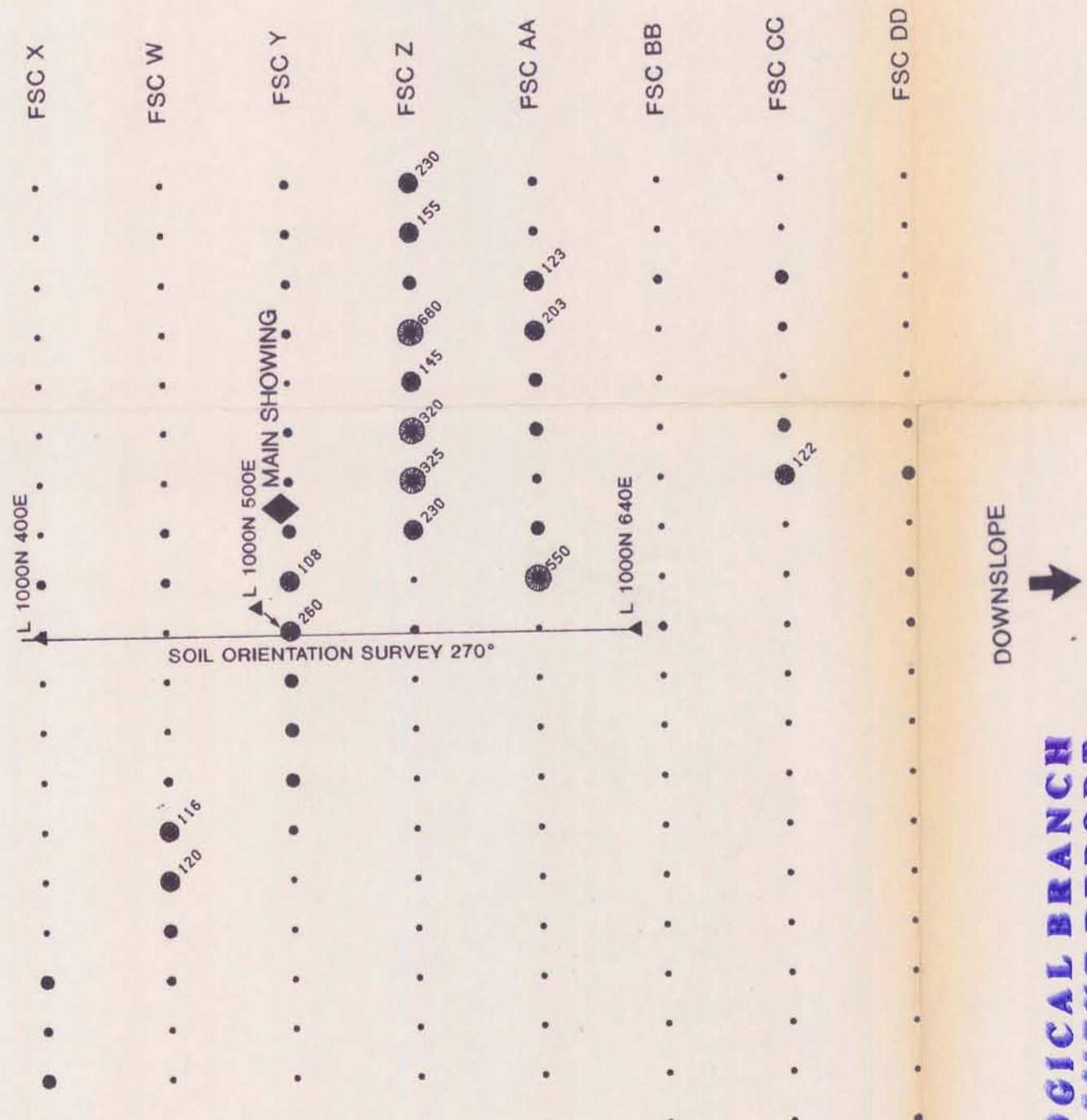
DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/MAINSHOW

FIELD FILE  
POINTS: PB LOCASY  
POINTS: PB LOCASY



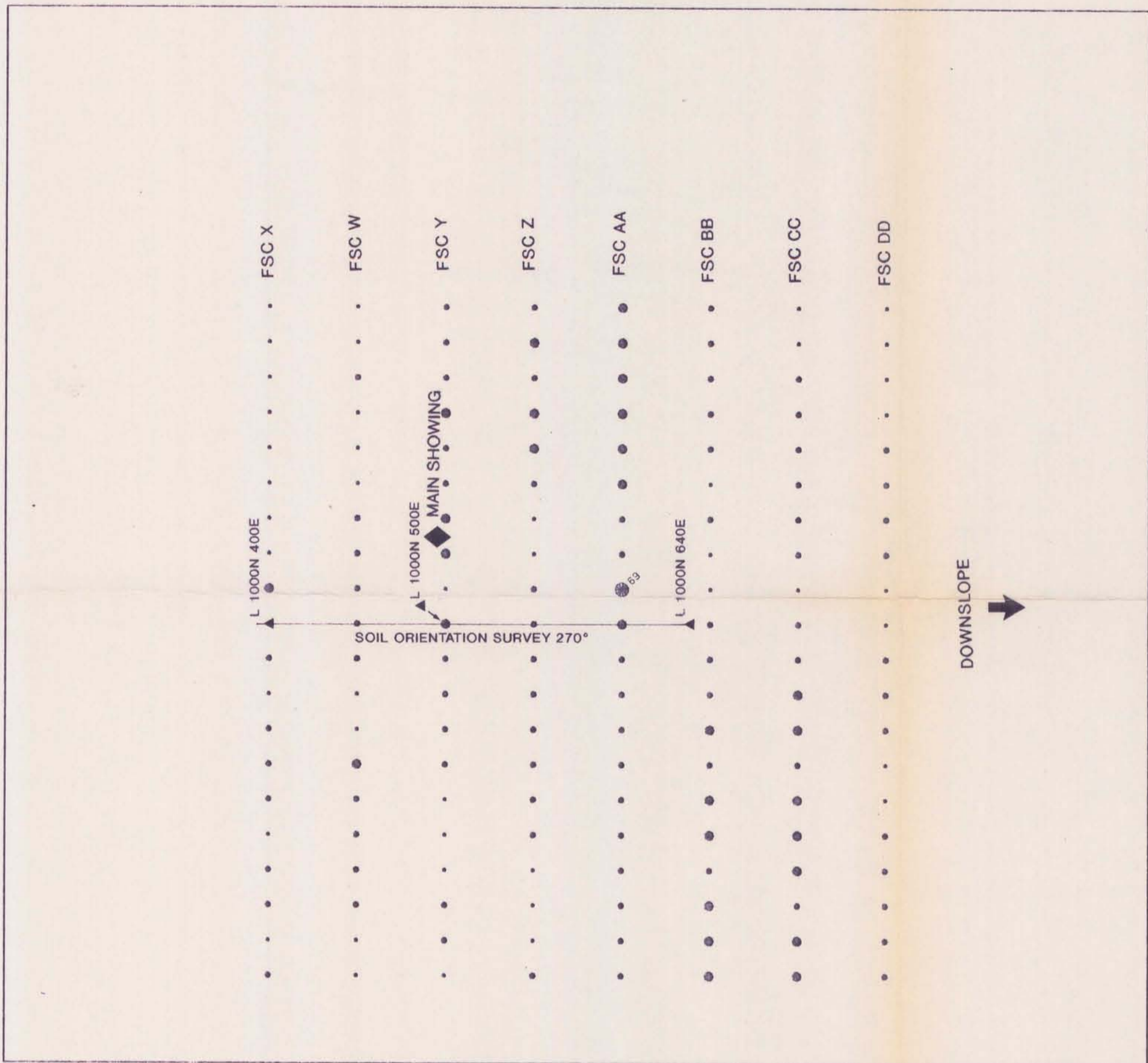
Figure 7b

DRAWN MG		PLACER DOME INC.	
DATE 90:01:25		FORS PROPERTY	
SCALE 1:2500		MAIN SHOWING SOIL GRID	
		LEAD IN PPM	
		NO.	PLATE



GEOLOGICAL BRANCH  
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FORS PROPERTY  
MAIN SHOWING SOIL GRID  
COPPER IN PPM

LEGEND

- <20 PPM COPPER
- 20 - 34
- 35 - 59
- >60 PPM COPPER



DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\MAINSHOW

	FIELD	FILE
POINTS:	CU	LOCASY
POINTS:	CU	LOCASY

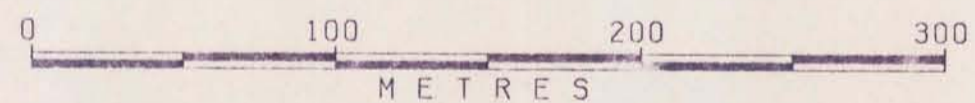
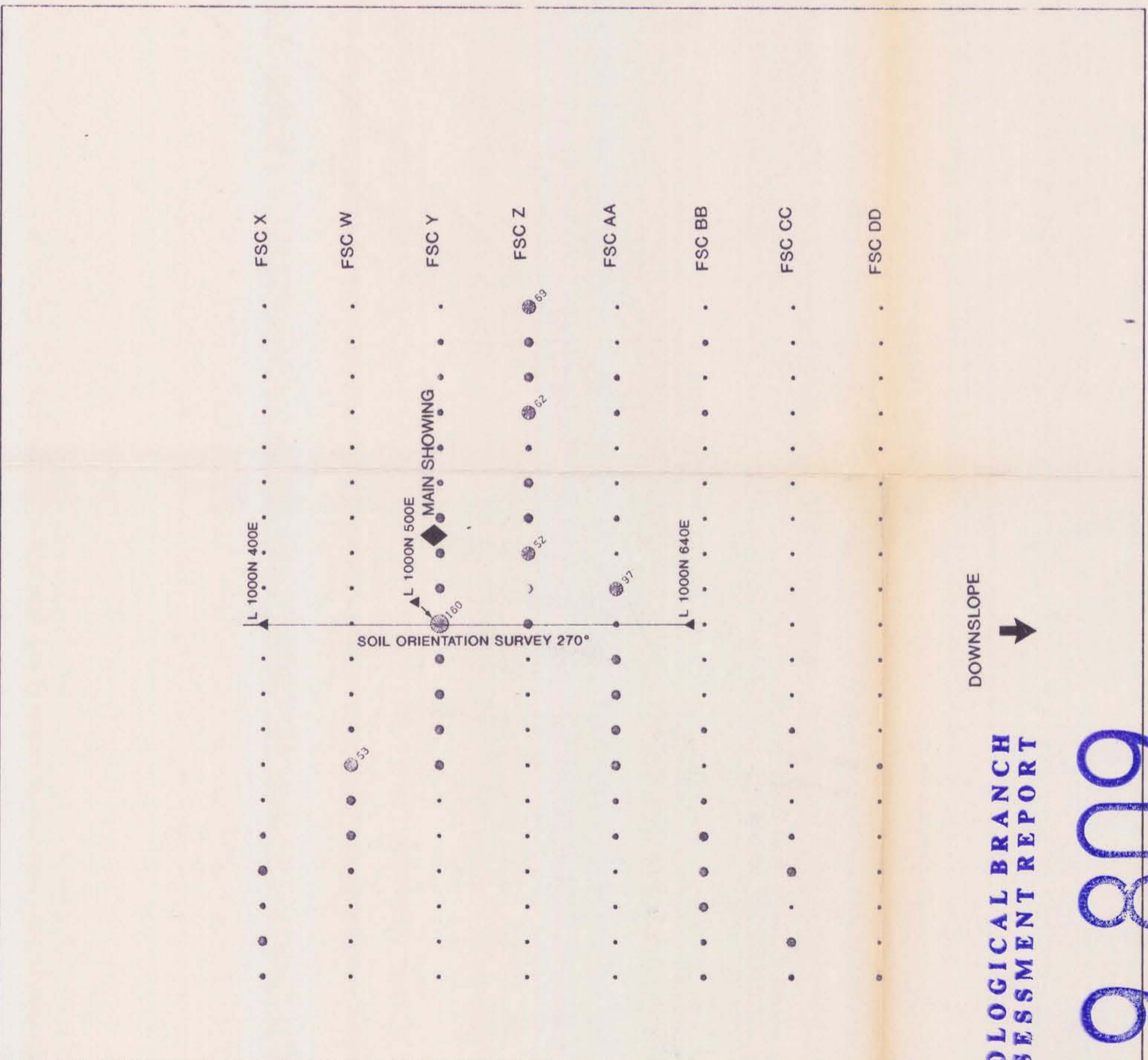


Figure 8a

DRAWN MG		PLACER DOME INC.	
DATE 90:01:25		FORS PROPERTY	
SCALE 1:2500		MAIN SHOWING SOIL GRID	
		COPPER IN PPM	
		NO.	PLATE



FORS PROPERTY  
MAIN SHOWING SOIL GRID  
ARSENIC IN PPM

LEGEND

- <10 PPM ARSENIC
- 10 - 19
- 20 - 49
- 50 - 99
- >100 PPM ARSENIC



DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\MAINSHOW

	FIELD	FILE
POINTS:	AS	LOCASY
POINTS:	AS	LOCASY



Figure 8b

DRAWN MG		PLACER DOME INC.	
DATE 90:01:25		FORS PROPERTY	
SCALE 1:2500		MAIN SHOWING SOIL GRID	
		ARSENIC IN PPM	
		NO.	PLATE

GEOLOGICAL BRANCH  
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FORS PROPERTY  
MAIN SHOWING SOIL GRID  
SILVER IN PPM

LEGEND

- <0.5 PPM SILVER
- 0.5 - 0.9
- >1.0 PPM SILVER



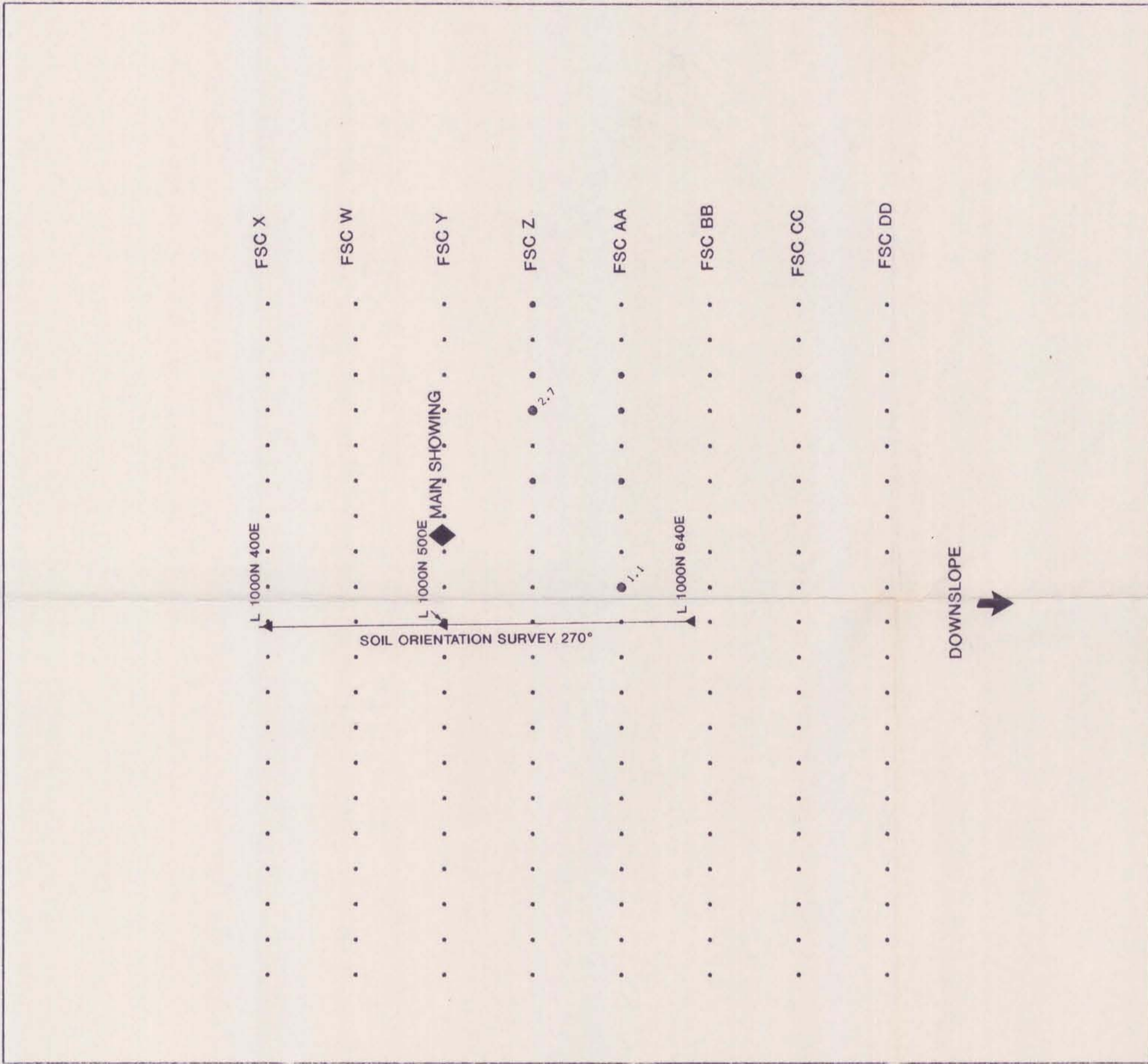
DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/MAINSHOW

	FIELD	FILE
POINTS:	AG	LOCASY
POINTS:	AG	LOCASY



Figure 9a

DRAWN MG		PLACER DOME INC.	
DATE 90:01:25		FORS PROPERTY	
SCALE 1:2500		MAIN SHOWING SOIL GRID	
		SILVER IN PPM	
		NO.	PLATE



FORS PROPERTY  
MAIN SHOWING SOIL GRID  
GOLD IN PPB

LEGEND

- <5 PPB GOLD
- 5 - 19
- 20 - 49
- 50 - 99
- >100 PPB GOLD



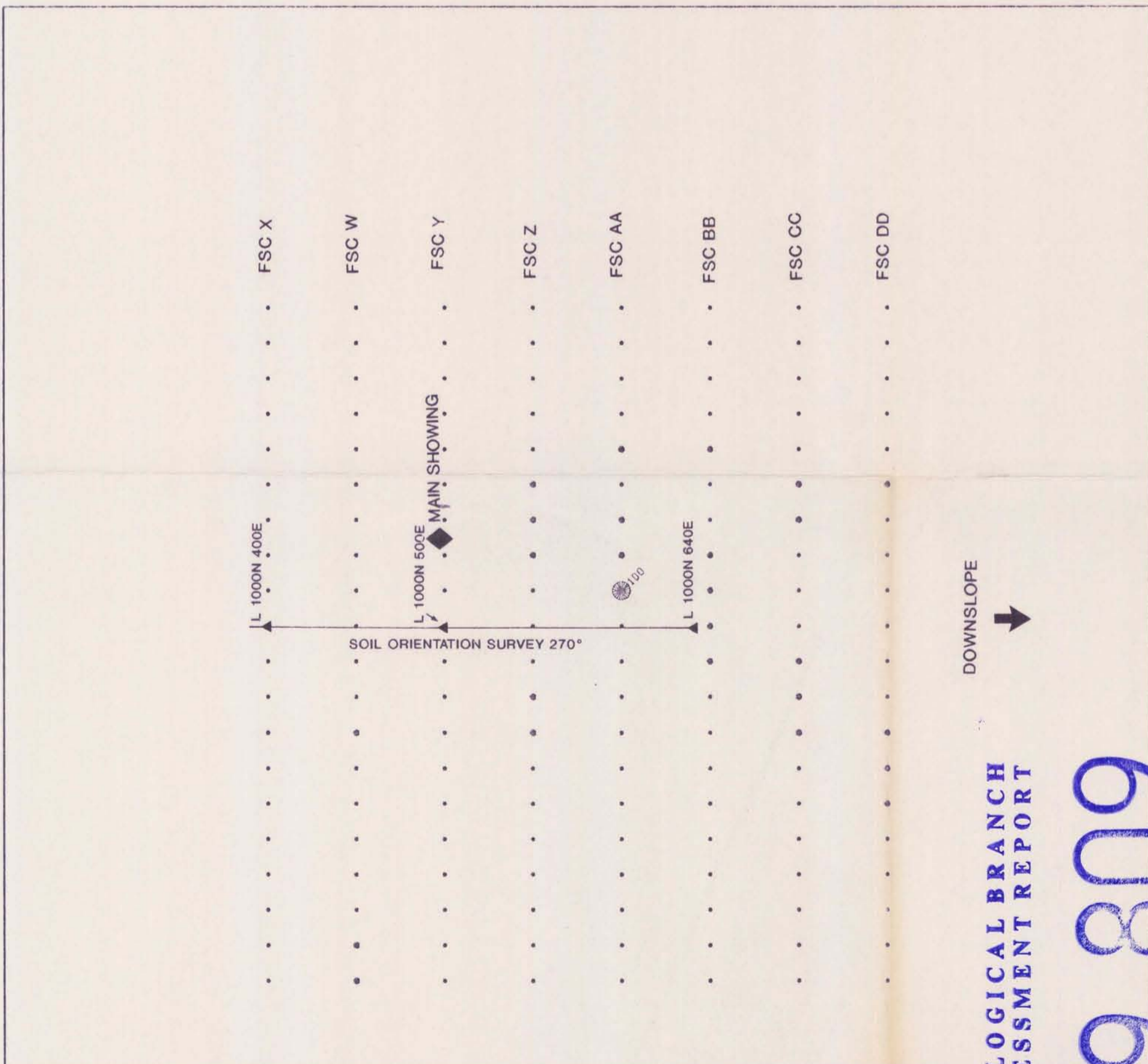
DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/MAINSHOW

	FIELD	FILE
POINTS:	AU1	LOCASY
POINTS:	AU1	LOCASY



Figure 9b

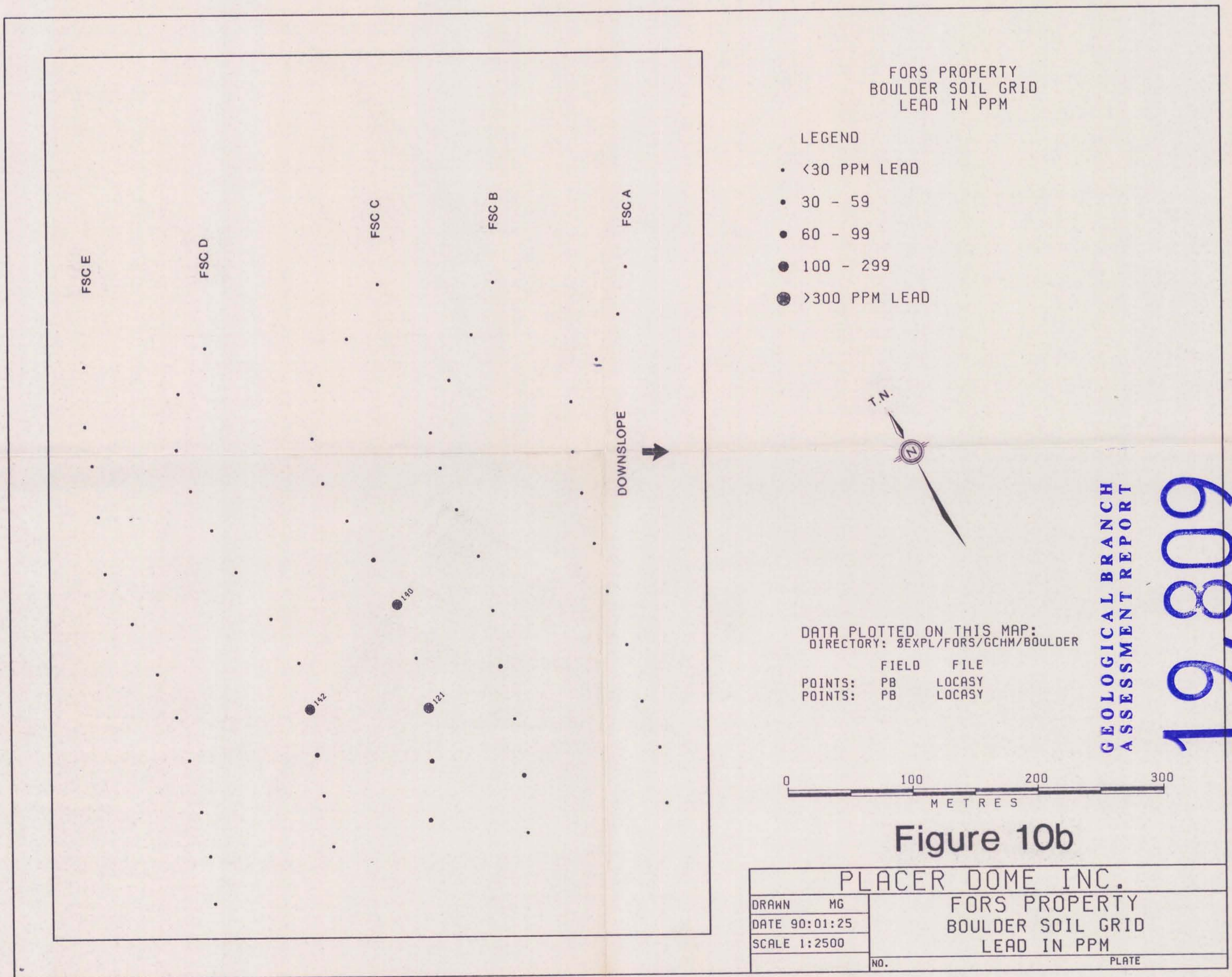
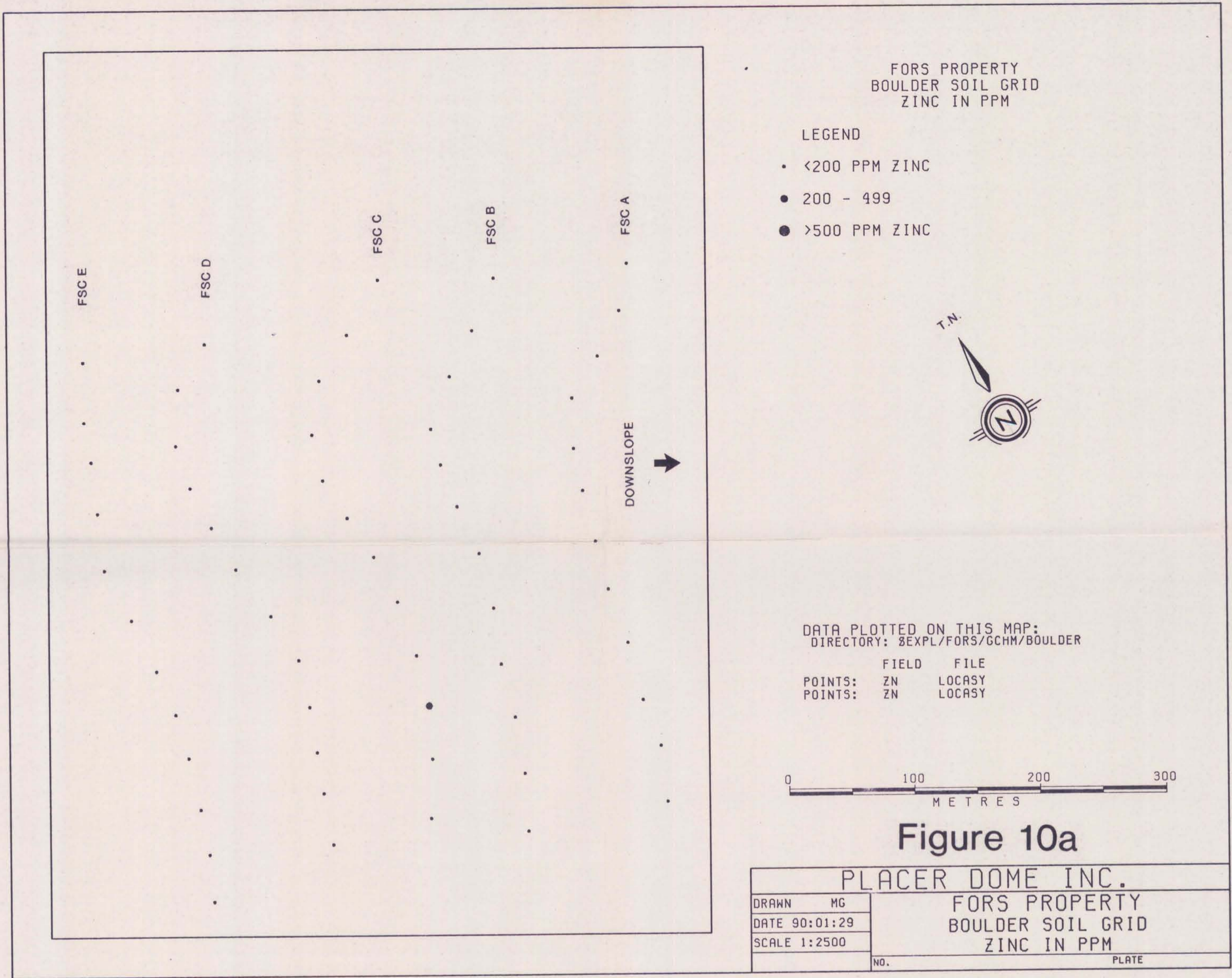
DRAWN MG		PLACER DOME INC.	
DATE 90:01:25		FORS PROPERTY	
SCALE 1:2500		MAIN SHOWING SOIL GRID	
		GOLD IN PPB	
		NO.	PLATE



GEOLOGICAL BRANCH  
ASSESSMENT REPORT

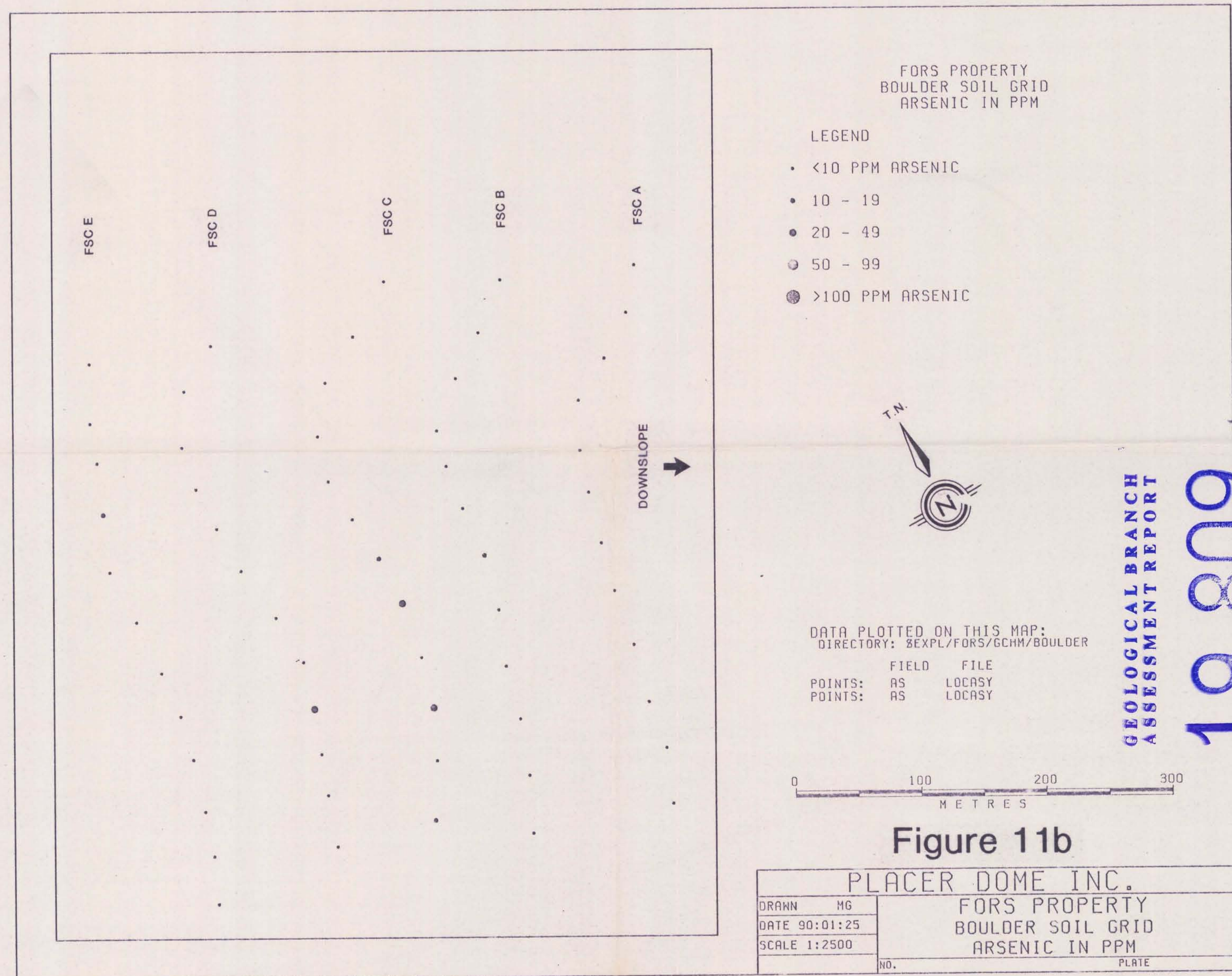
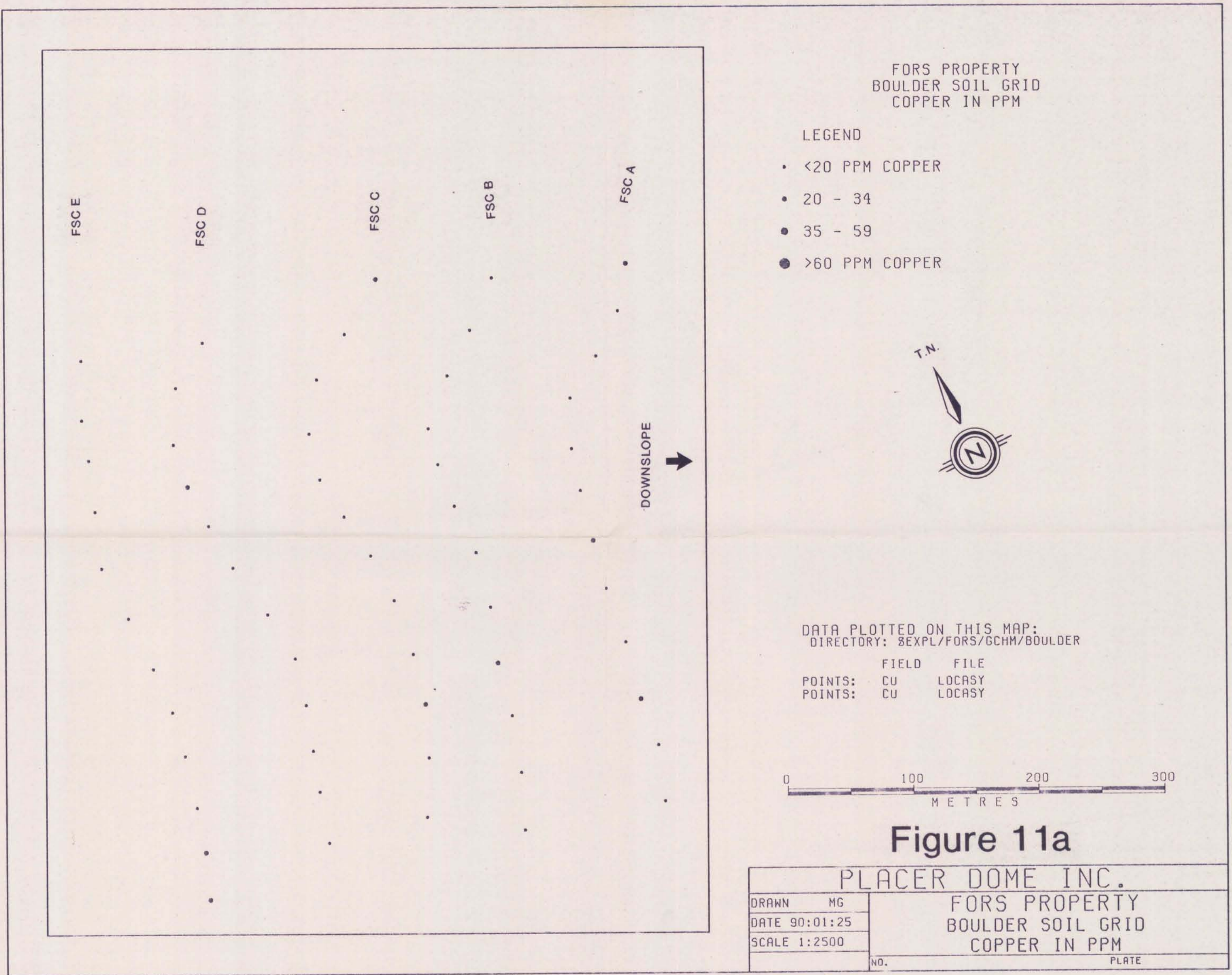
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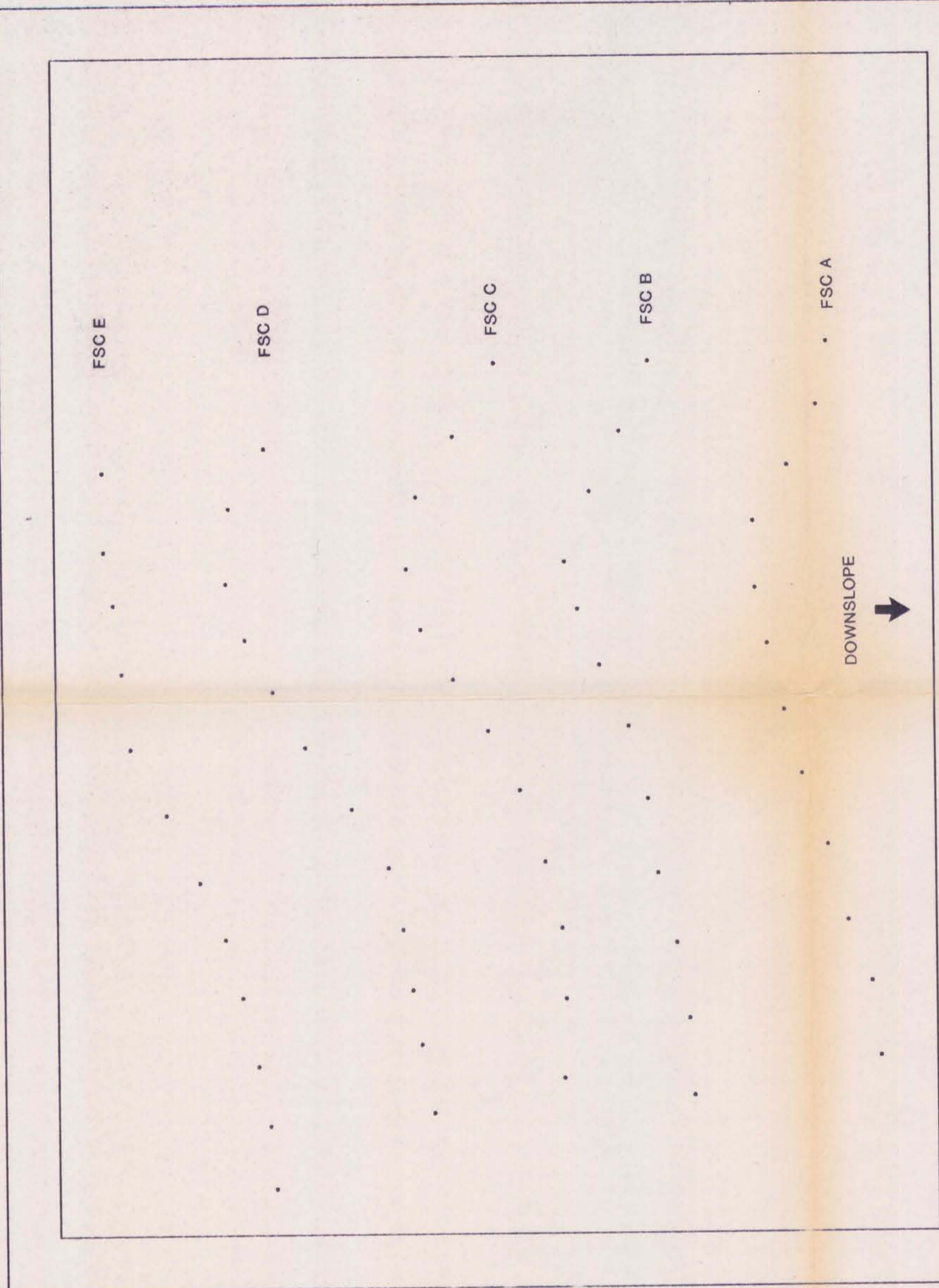




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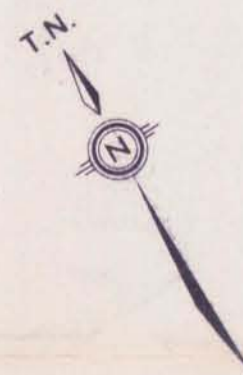




FORS PROPERTY  
BOULDER SOIL GRID  
SILVER IN PPM

LEGEND

- <0.5 PPM SILVER
- 0.5 - 0.9
- >1.0 PPM SILVER



DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/BOULDER

	FIELD	FILE
POINTS:	AG	LOCASY
POINTS:	AG	LOCASY

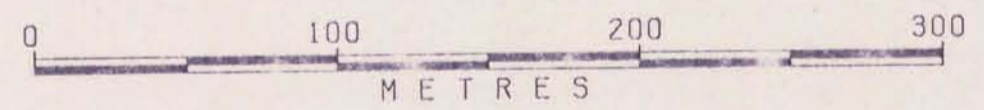
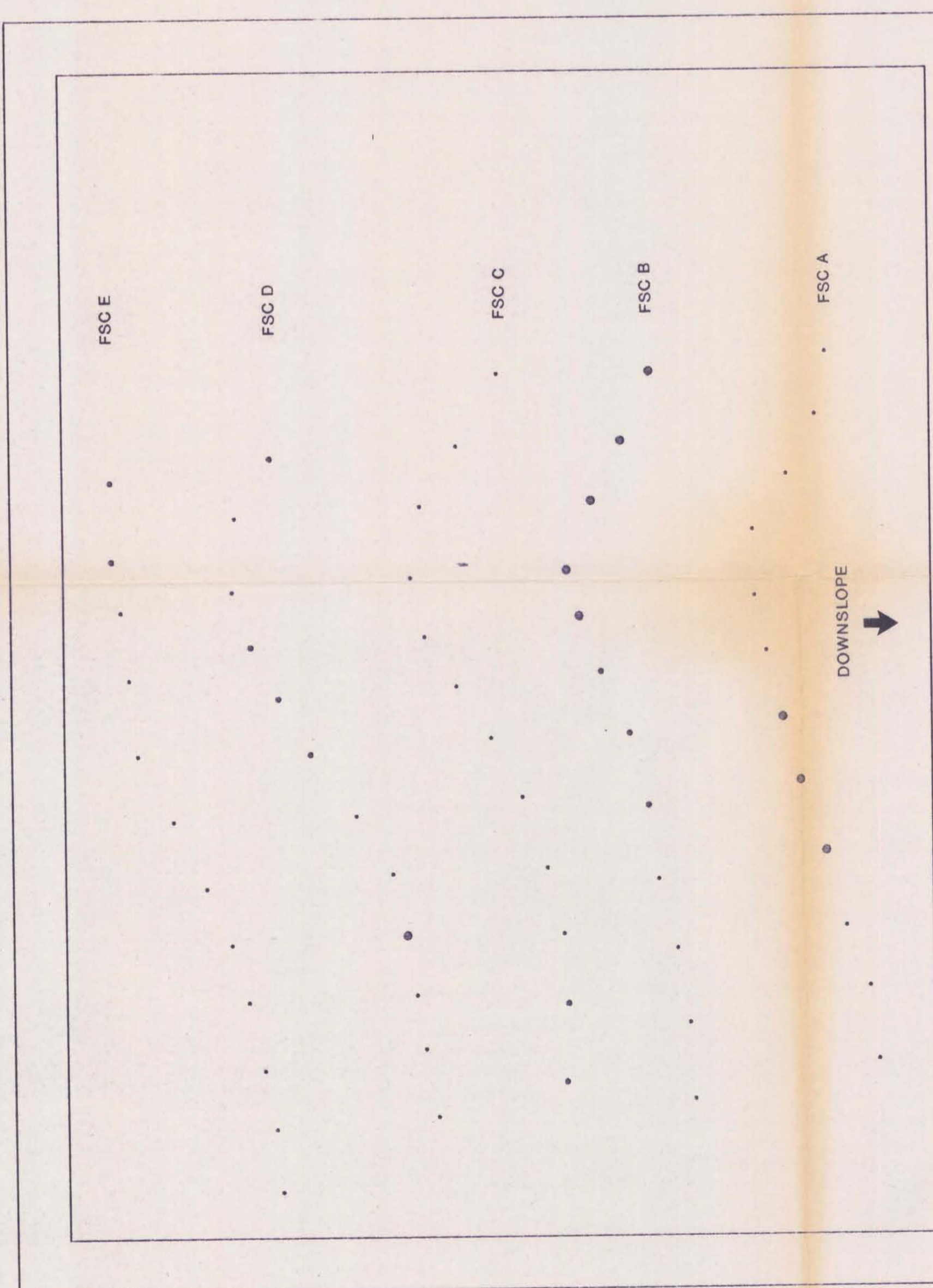


Figure 12a

DRAWN		MG	PLACER DOME INC.	
DATE		90:01:25	FORS PROPERTY	
SCALE		1:2500	BOULDER SOIL GRID	
			SILVER IN PPM	
			NO.	PLATE



FORS PROPERTY  
BOULDER SOIL GRID  
GOLD IN PPB

LEGEND

- <5 PPB GOLD
- 5 - 19
- 20 - 49
- 50 - 99
- >100 PPB GOLD



DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/BOULDER

	FIELD	FILE
POINTS:	AU1	LOCASY
POINTS:	AU1	LOCASY

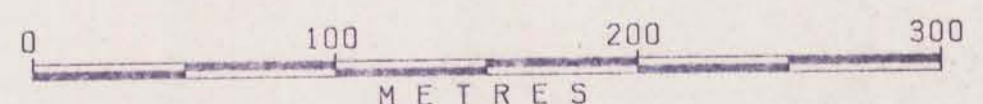


Figure 12b

DRAWN		MG	PLACER DOME INC.	
DATE		90:01:25	FORS PROPERTY	
SCALE		1:2500	BOULDER SOIL GRID	
			GOLD IN PPB	
			NO.	PLATE

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FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
ZINC IN PPM

LEGEND

- <200 PPM ZINC
- 200 - 499
- >500 PPM ZINC



DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/LAMBCRK

	FIELD	FILE
POINTS:	ZN	LOCASY
POINTS:	ZN	LOCASY

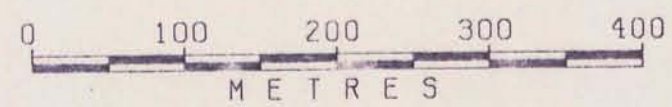


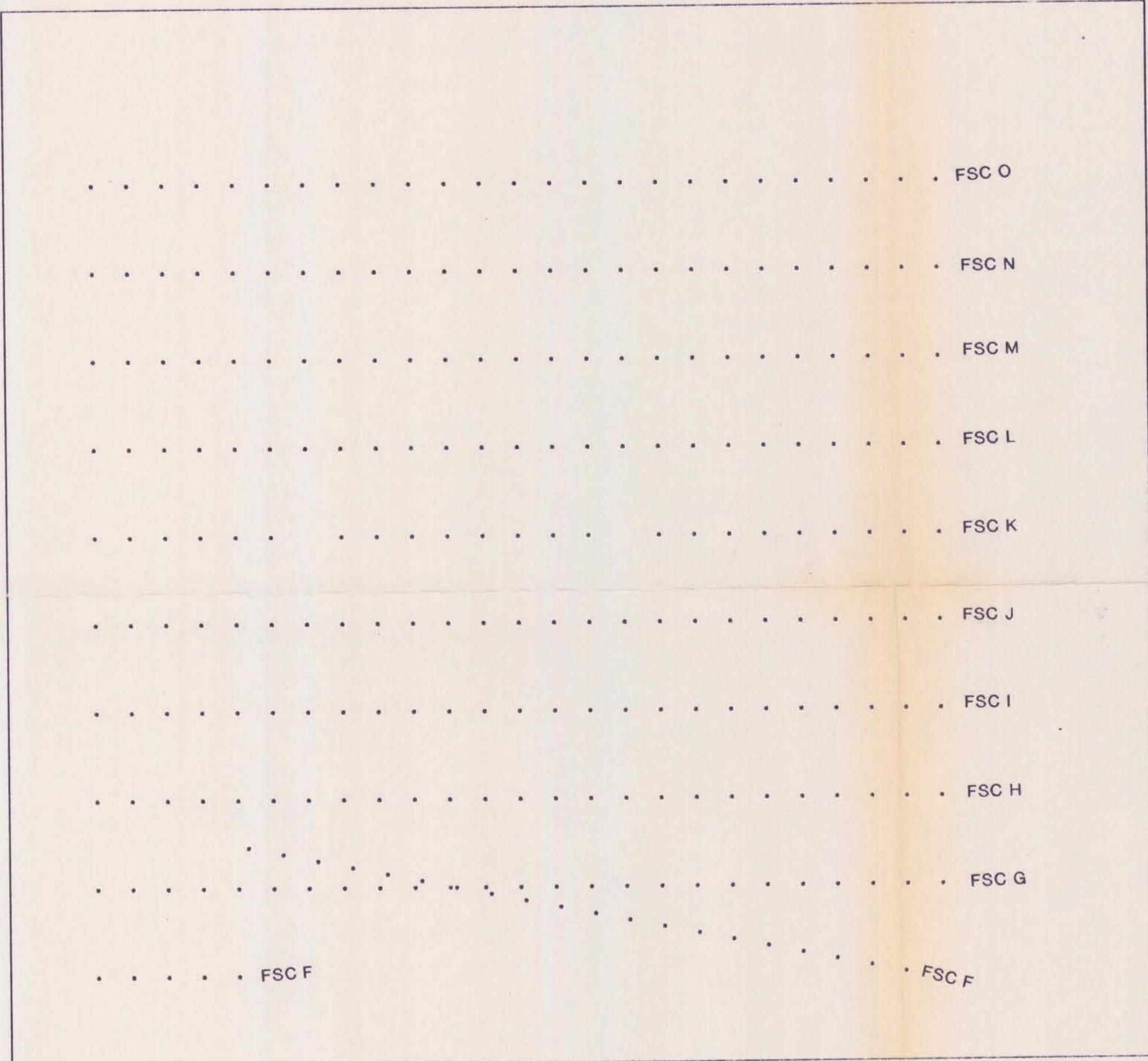
Figure 13a

PLACER DOME INC.

DRAWN	MG
DATE	90:01:15
SCALE	1:5000

FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
ZINC IN PPM

NO.	PLATE
-----	-------



FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
COPPER IN PPM

LEGEND

- <20 PPM COPPER
- 20 - 34
- 35 - 59
- >60 PPM COPPER



DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/LAMBCRK

	FIELD	FILE
POINTS:	CU	LOCASY
POINTS:	CU	LOCASY

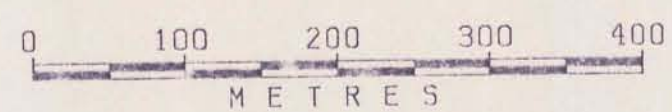


Figure 13b

PLACER DOME INC.

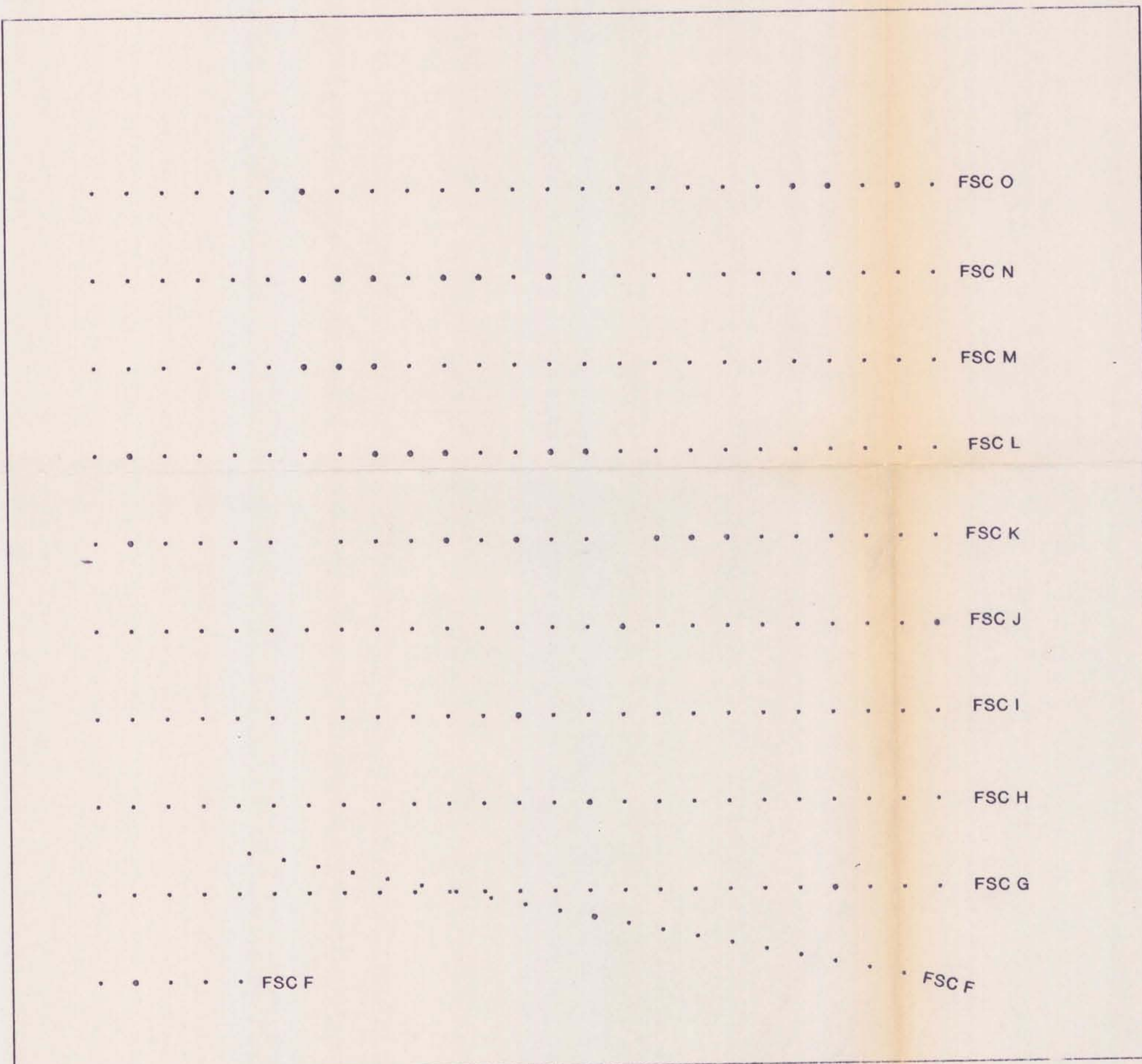
DRAWN	MG
DATE	90:01:15
SCALE	1:5000

FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
COPPER IN PPM

NO.	PLATE
-----	-------

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FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
ARSENIC IN PPM

LEGEND

- <10 PPM ARSENIC
- 10 - 19
- 20 - 49
- 50 - 99
- >100 PPM ARSENIC



DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\LAMBCRK

FIELD FILE  
POINTS: AS LOCASY  
POINTS: AS LOCASY

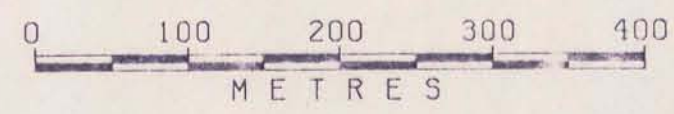
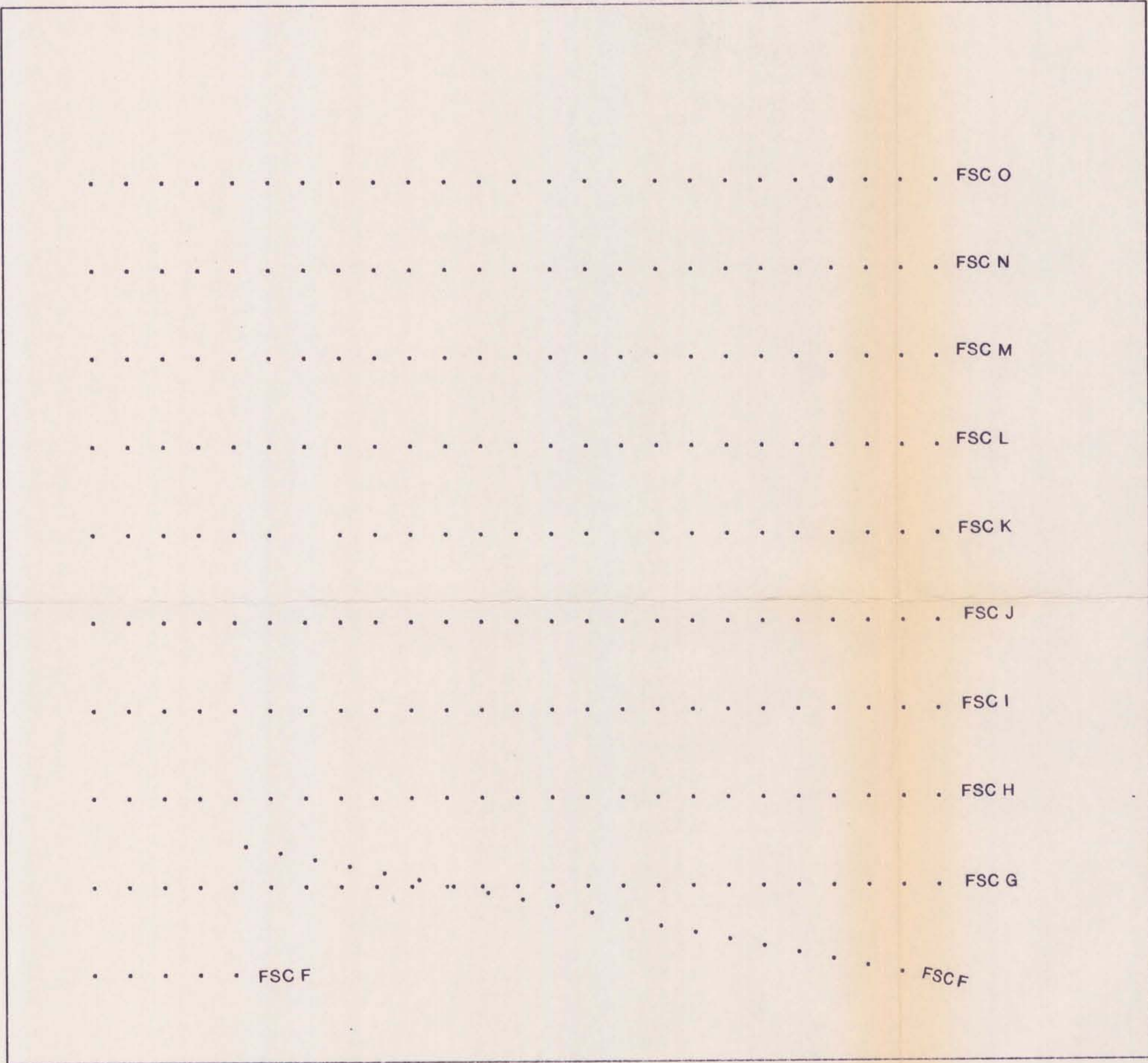


Figure 14a

DRAWN MG		PLACER DOME INC.	
DATE 90:01:15		FORS PROPERTY	
SCALE 1:5000		LITTLE LAMB CREEK SOIL GRID	
		ARSENIC IN PPM	
		NO.	PLATE



FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
LEAD IN PPM

LEGEND

- <30 PPM LEAD
- 30 - 59
- 60 - 99
- 100 - 299
- >300 PPM LEAD



DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\LAMBCRK

FIELD FILE  
POINTS: PB LOCASY  
POINTS: PB LOCASY

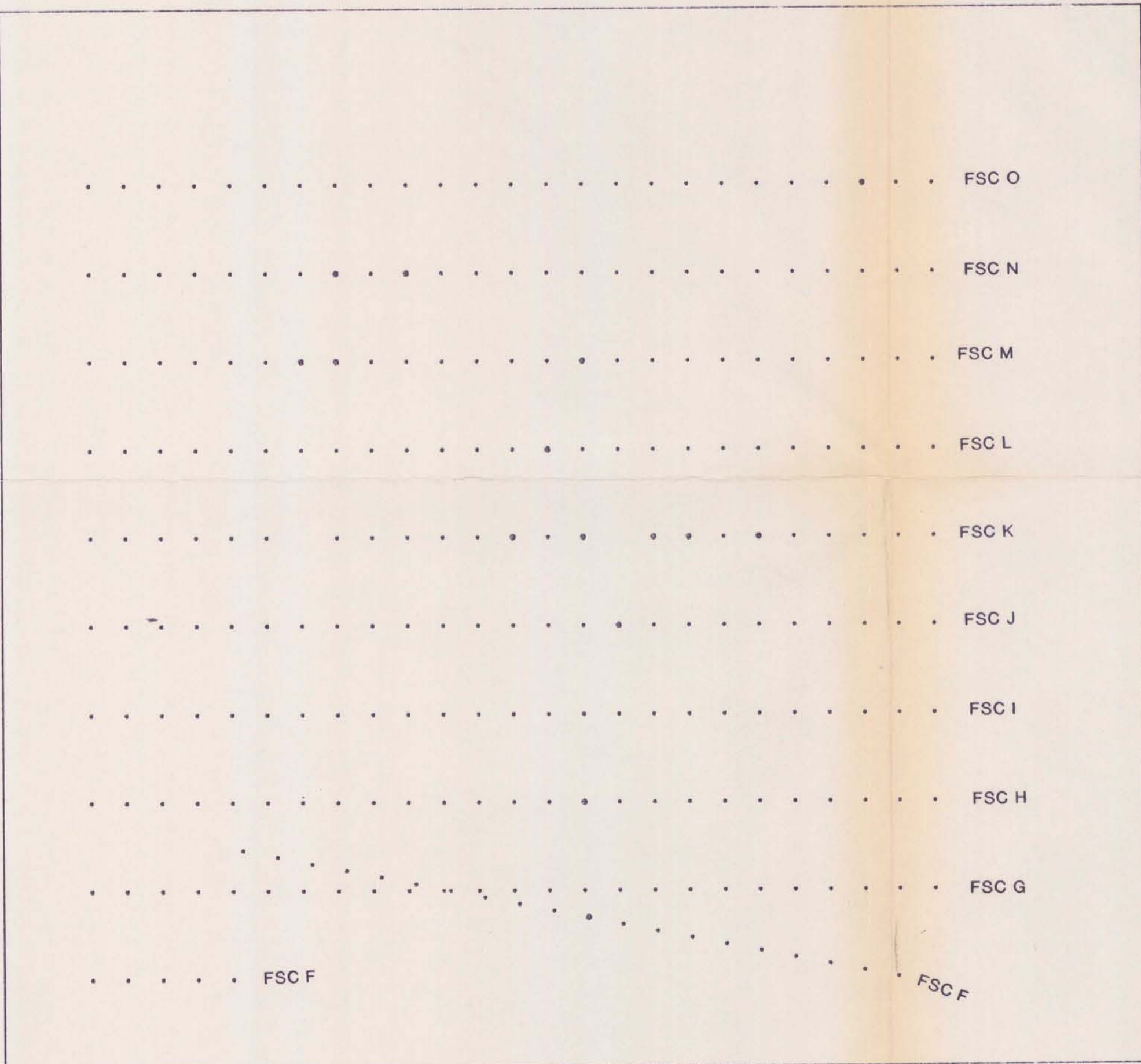


Figure 14b

DRAWN MG		PLACER DOME INC.	
DATE 90:01:15		FORS PROPERTY	
SCALE 1:5000		LITTLE LAMB CREEK SOIL GRID	
		LEAD IN PPM	
		NO.	PLATE

GEOLOGICAL BRANCH  
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FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
SILVER IN PPM

LEGEND

- <0.5 PPM SILVER
- 0.5 - 0.9
- >1.0 PPM SILVER



DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\LAMBCKR

	FIELD	FILE
POINTS:	AG	LOCASY
POINTS:	AG	LOCASY

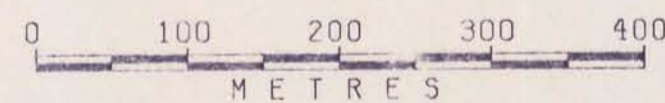
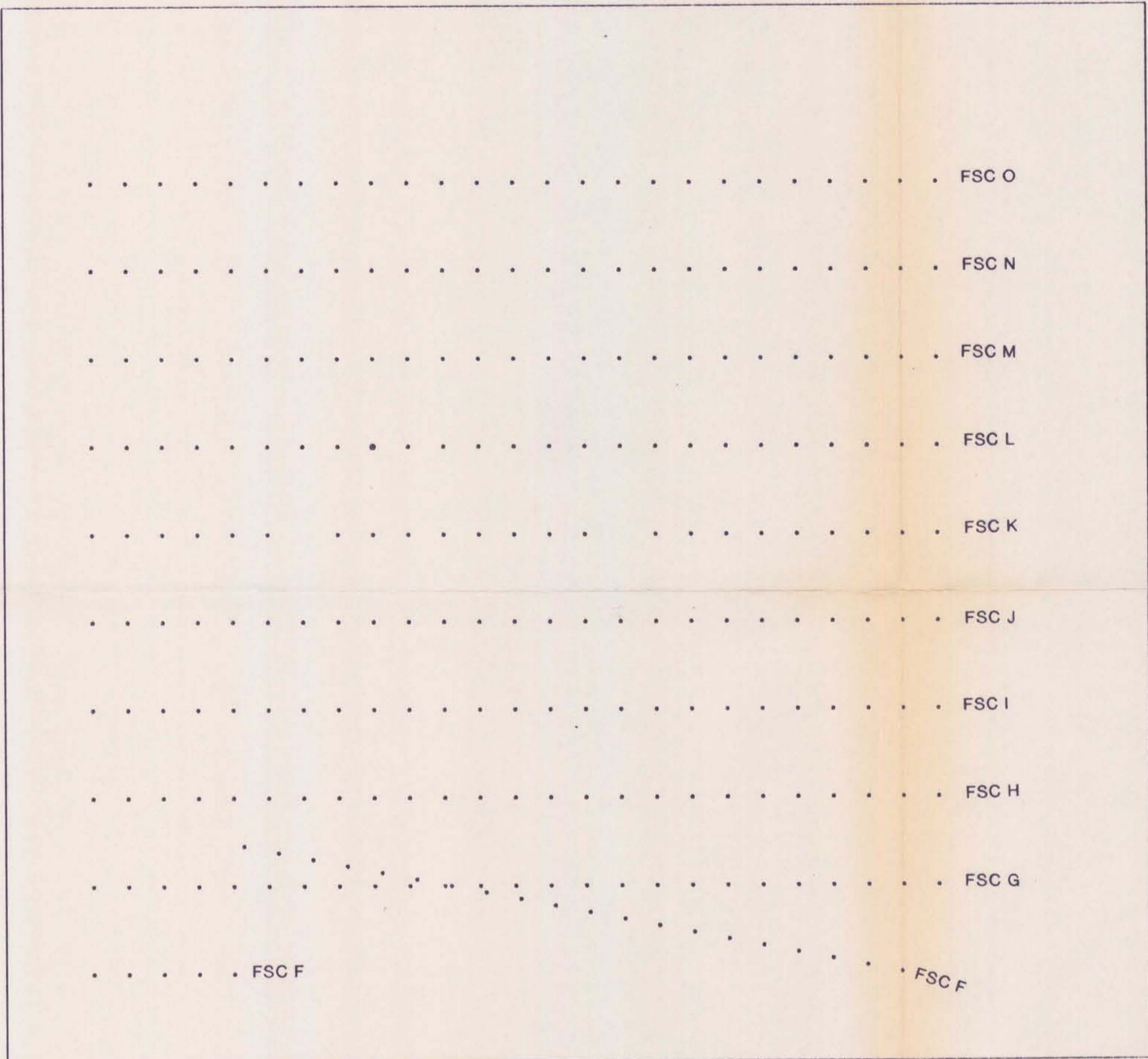


Figure 15a

DRAWN MG		PLACER DOME INC.	
DATE 90:01:15		FORS PROPERTY	
SCALE 1:5000		LITTLE LAMB CREEK SOIL GRID	
		SILVER IN PPM	
		NO.	PLATE



FORS PROPERTY  
LITTLE LAMB CREEK SOIL GRID  
GOLD IN PPB

LEGEND

- <5 PPB GOLD
- 5 - 19
- 20 - 49
- 50 - 99
- >100 PPB GOLD



DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\LAMBCKR

	FIELD	FILE
POINTS:	AU1	LOCASY
POINTS:	AU1	LOCASY

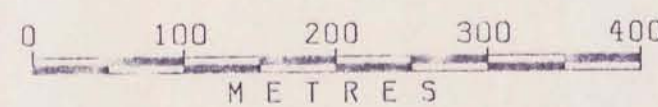
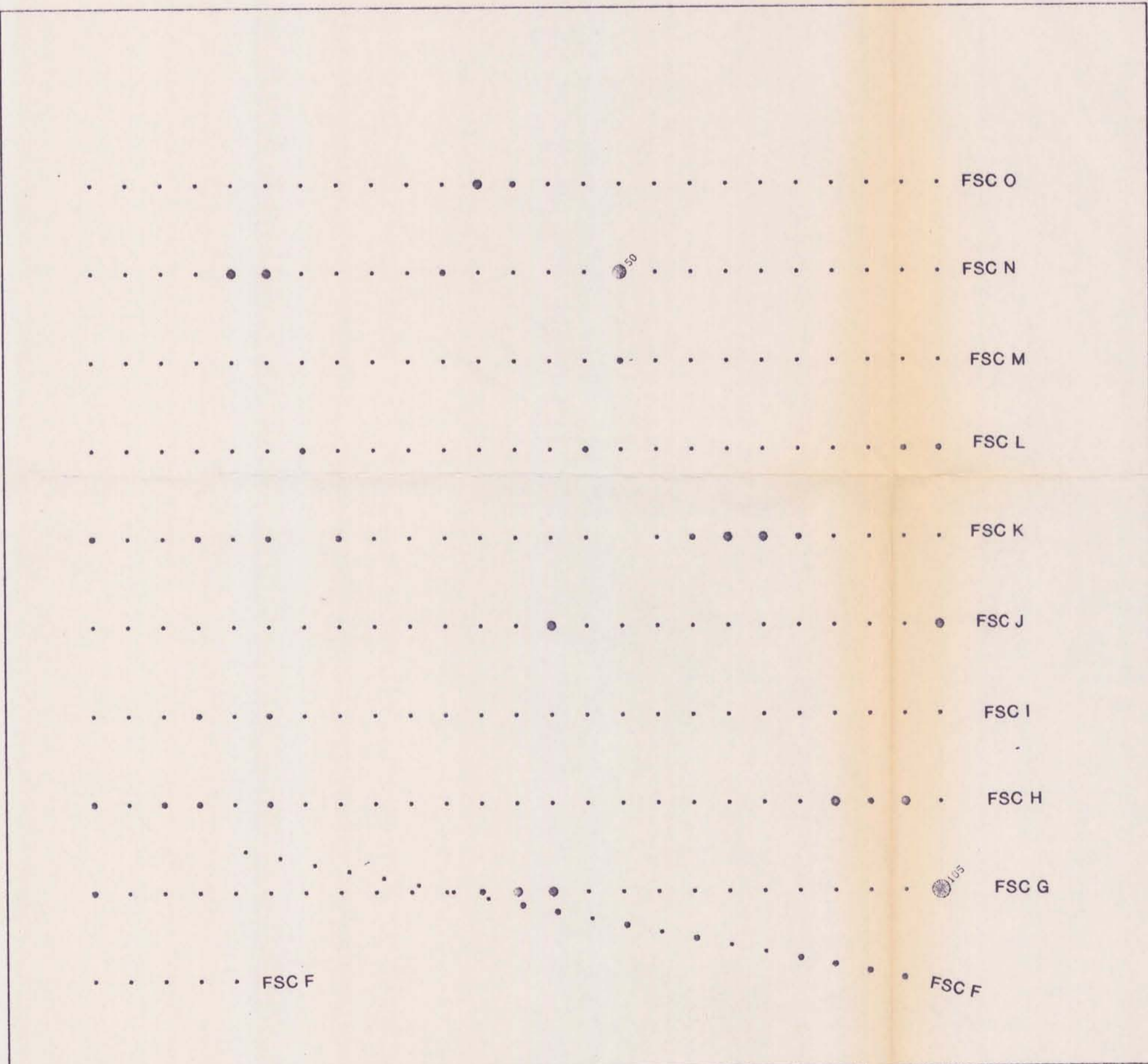


Figure 15b

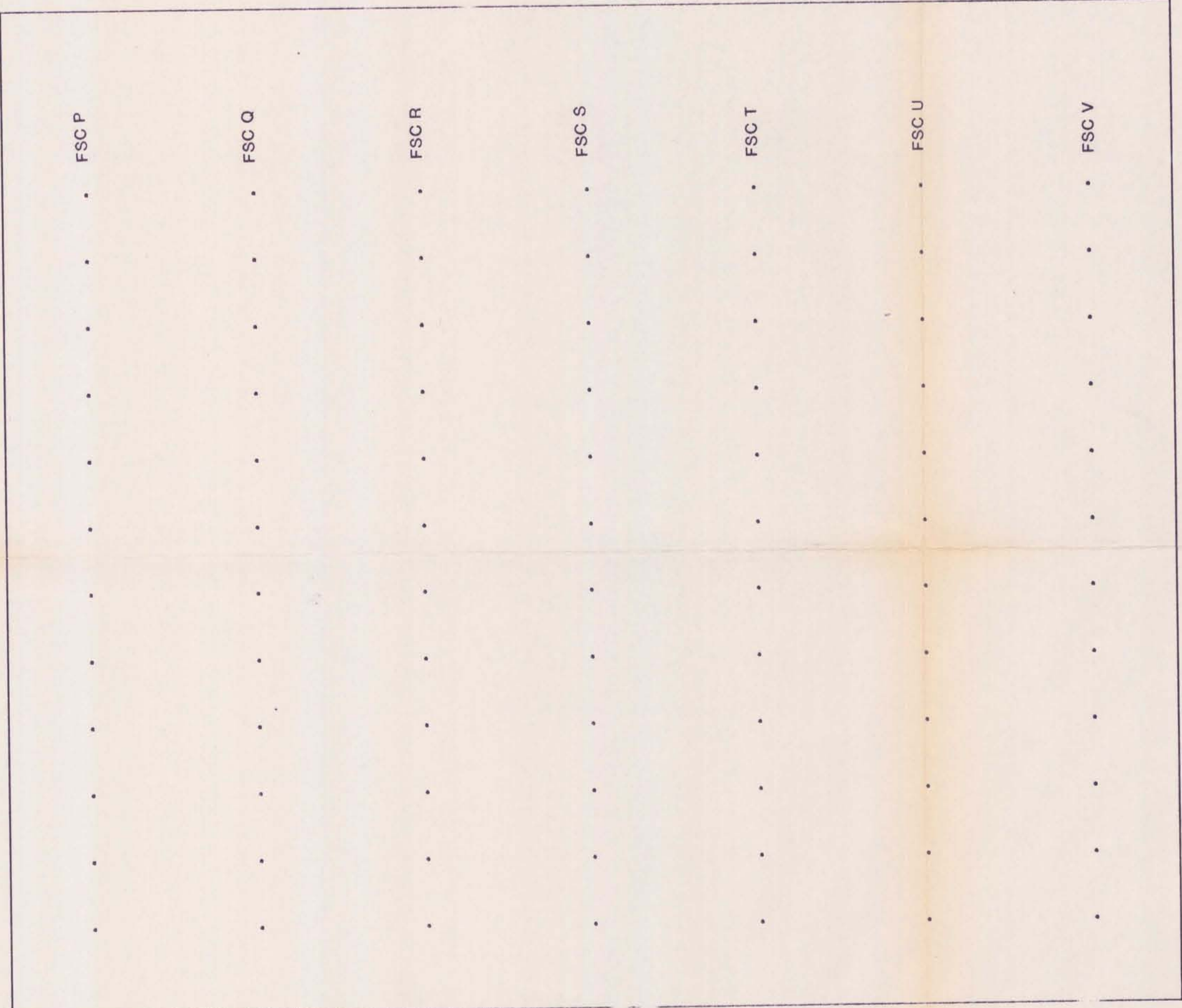
DRAWN MG		PLACER DOME INC.	
DATE 90:01:15		FORS PROPERTY	
SCALE 1:5000		LITTLE LAMB CREEK SOIL GRID	
		GOLD IN PPB	
		NO.	PLATE

GEOLOGICAL BRANCH  
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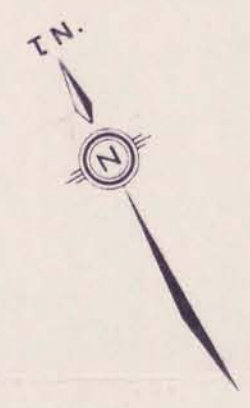




FORS PROPERTY  
GOLDHILL SOIL GRID  
ZINC IN PPM

LEGEND

- <200 PPM ZINC
- 200 - 499
- >500 PPM ZINC



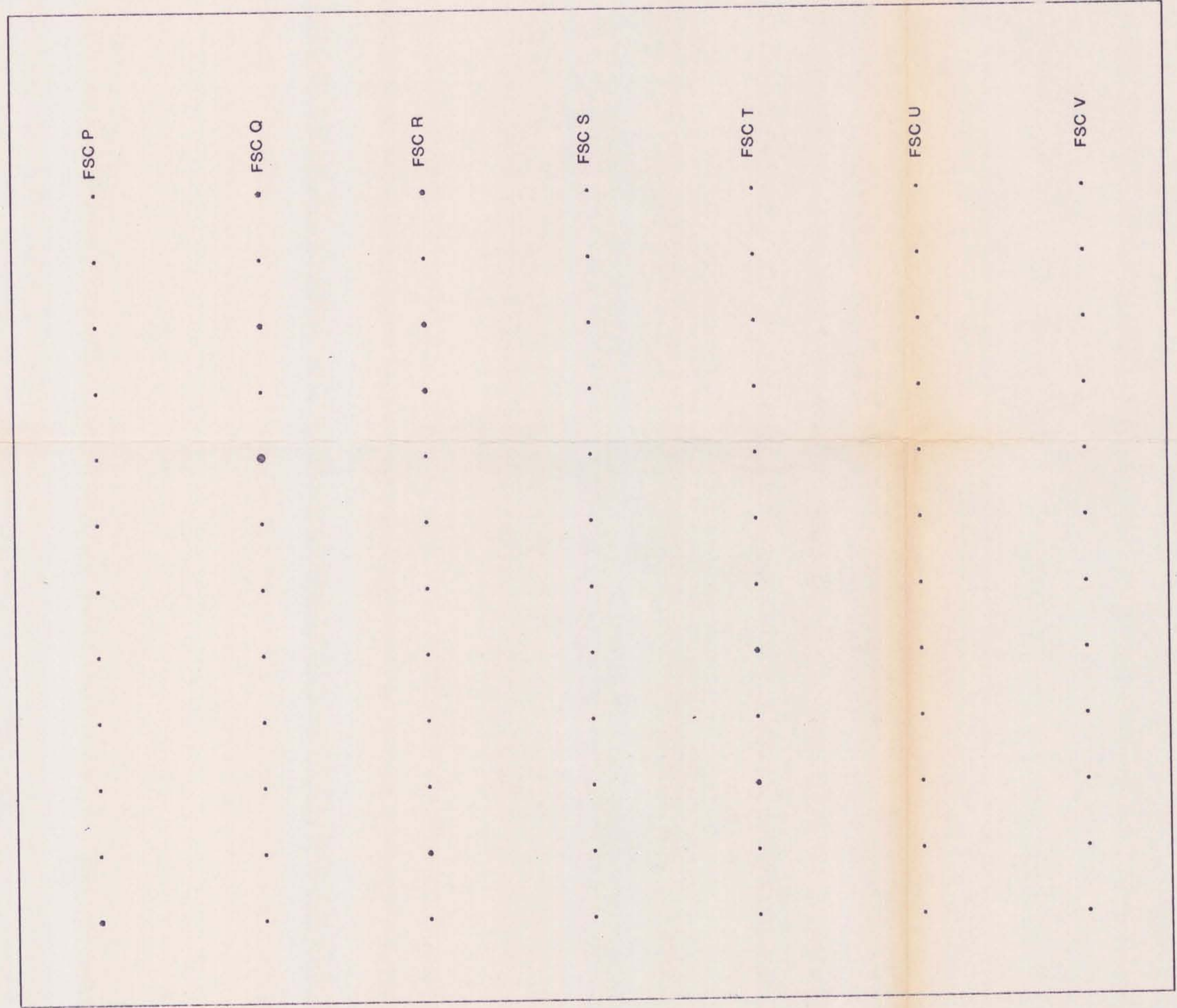
DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/GOLDHILL

	FIELD	FILE
POINTS:	ZN	LOCASY
POINTS:	ZN	LOCASY



Figure 16a

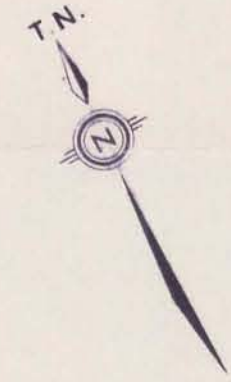
DRAWN		MG	PLACER DOME INC.	
DATE		90:01:25	FORS PROPERTY	
SCALE		1:2500	GOLDHILL SOIL GRID	
			ZINC IN PPM	
			NO.	PLATE



FORS PROPERTY  
GOLDHILL SOIL GRID  
LEAD IN PPM

LEGEND

- <30 PPM LEAD
- 30 - 59
- 60 - 99
- 100 - 299
- >300 PPM LEAD



DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/GOLDHILL

	FIELD	FILE
POINTS:	PB	LOCASY
POINTS:	PB	LOCASY

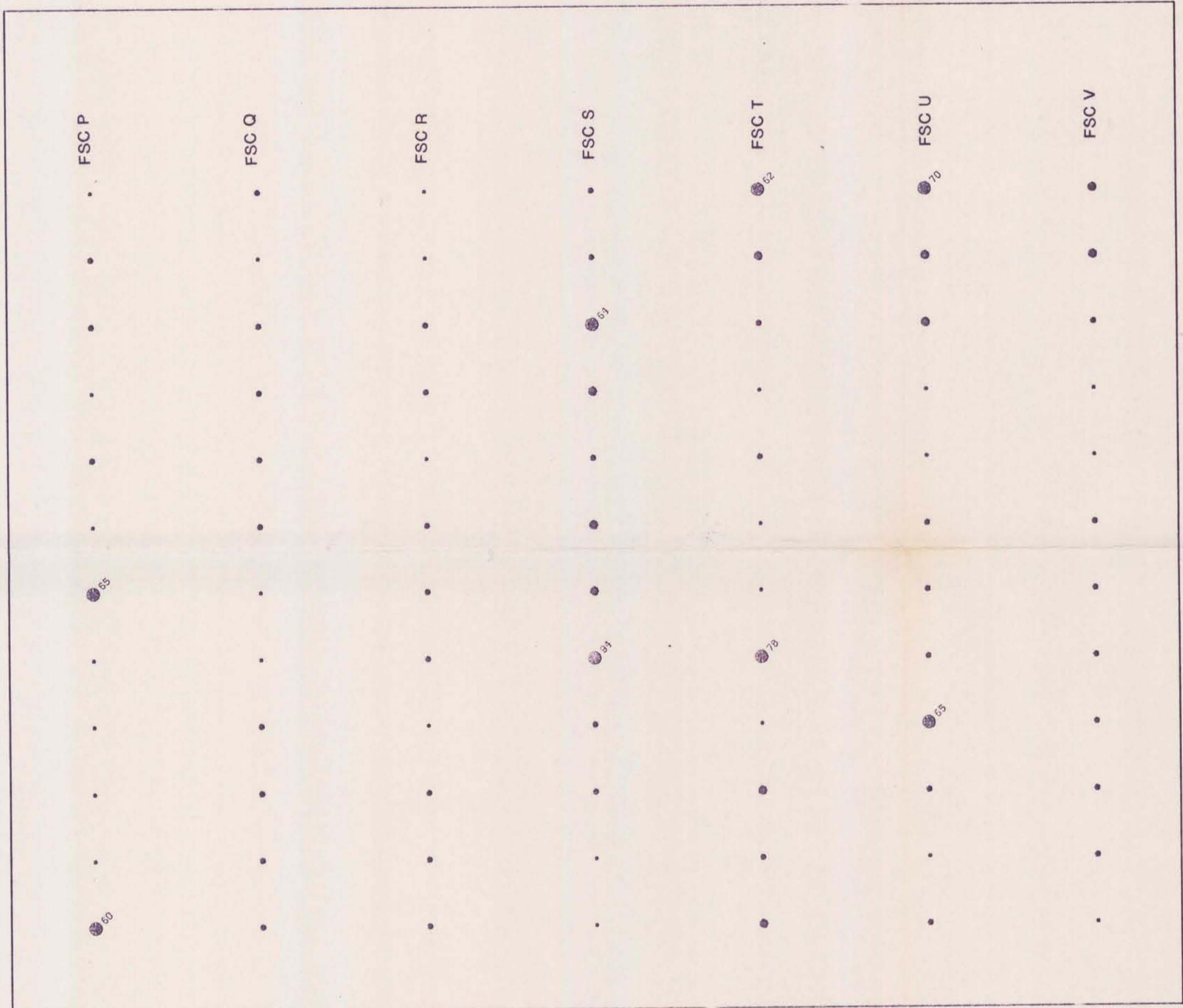


Figure 16b

DRAWN		MG	PLACER DOME INC.	
DATE		90:01:25	FORS PROPERTY	
SCALE		1:2500	GOLDHILL SOIL GRID	
			LEAD IN PPM	
			NO.	PLATE

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FORS PROPERTY  
GOLDHILL SOIL GRID  
COPPER IN PPM

LEGEND

- <20 PPM COPPER
- 20 - 34
- 35 - 59
- >60 PPM COPPER



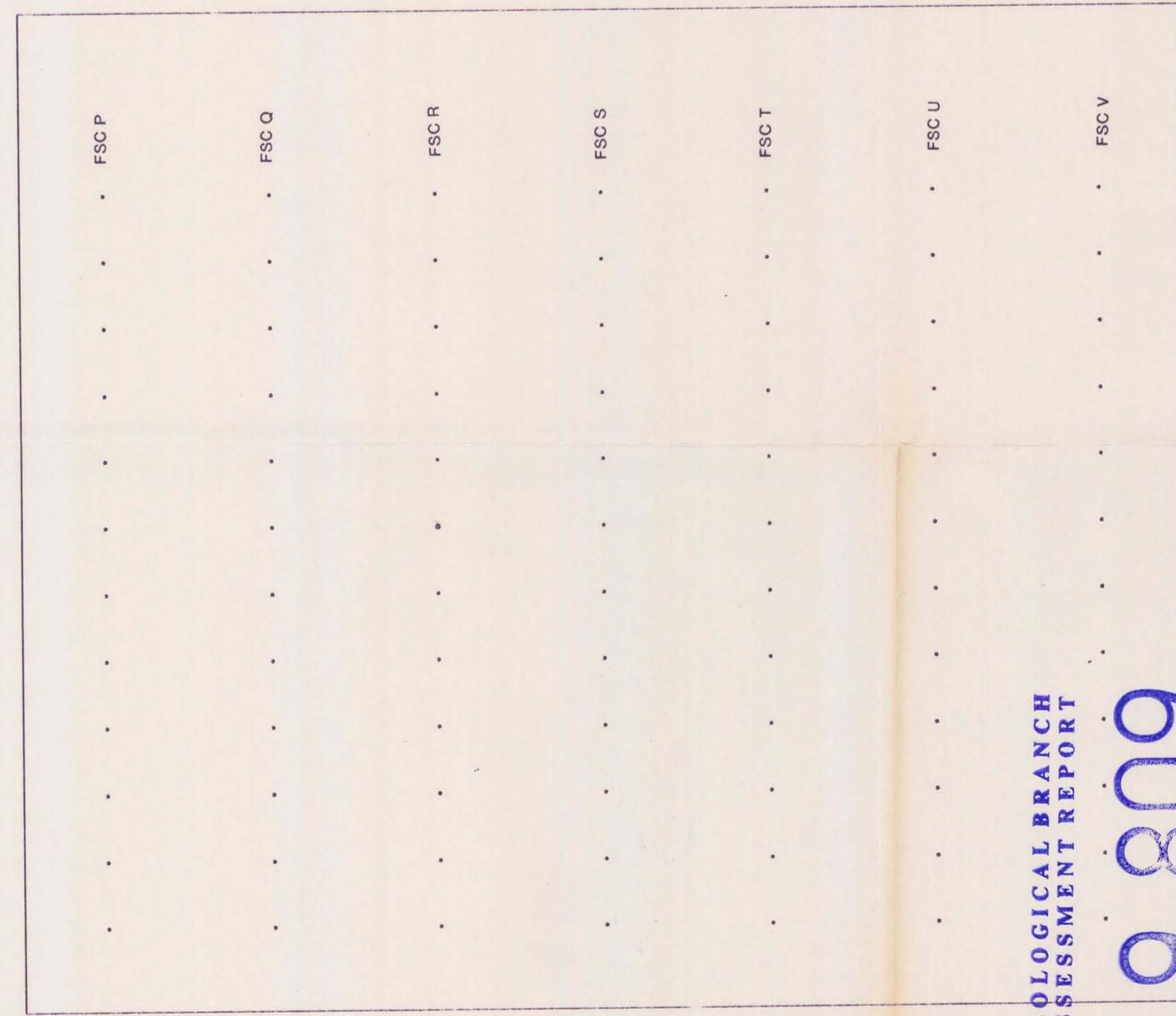
DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\GOLDHILL

	FIELD	FILE
POINTS:	CU	LOCASY
POINTS:	CU	LOCASY



Figure 17a

DRAWN		MG	PLACER DOME INC.	
DATE		90:01:25	FORS PROPERTY	
SCALE		1:2500	GOLDHILL SOIL GRID	
			COPPER IN PPM	
			NO.	PLATE



FORS PROPERTY  
GOLDHILL SOIL GRID  
ARSENIC IN PPM

LEGEND

- <10 PPM ARSENIC
- 10 - 19
- 20 - 49
- 50 - 99
- >100 PPM ARSENIC



DATA PLOTTED ON THIS MAP:  
DIRECTORY: \EXPL\FORS\GCHM\GOLDHILL

	FIELD	FILE
POINTS:	AS	LOCASY
POINTS:	AS	LOCASY

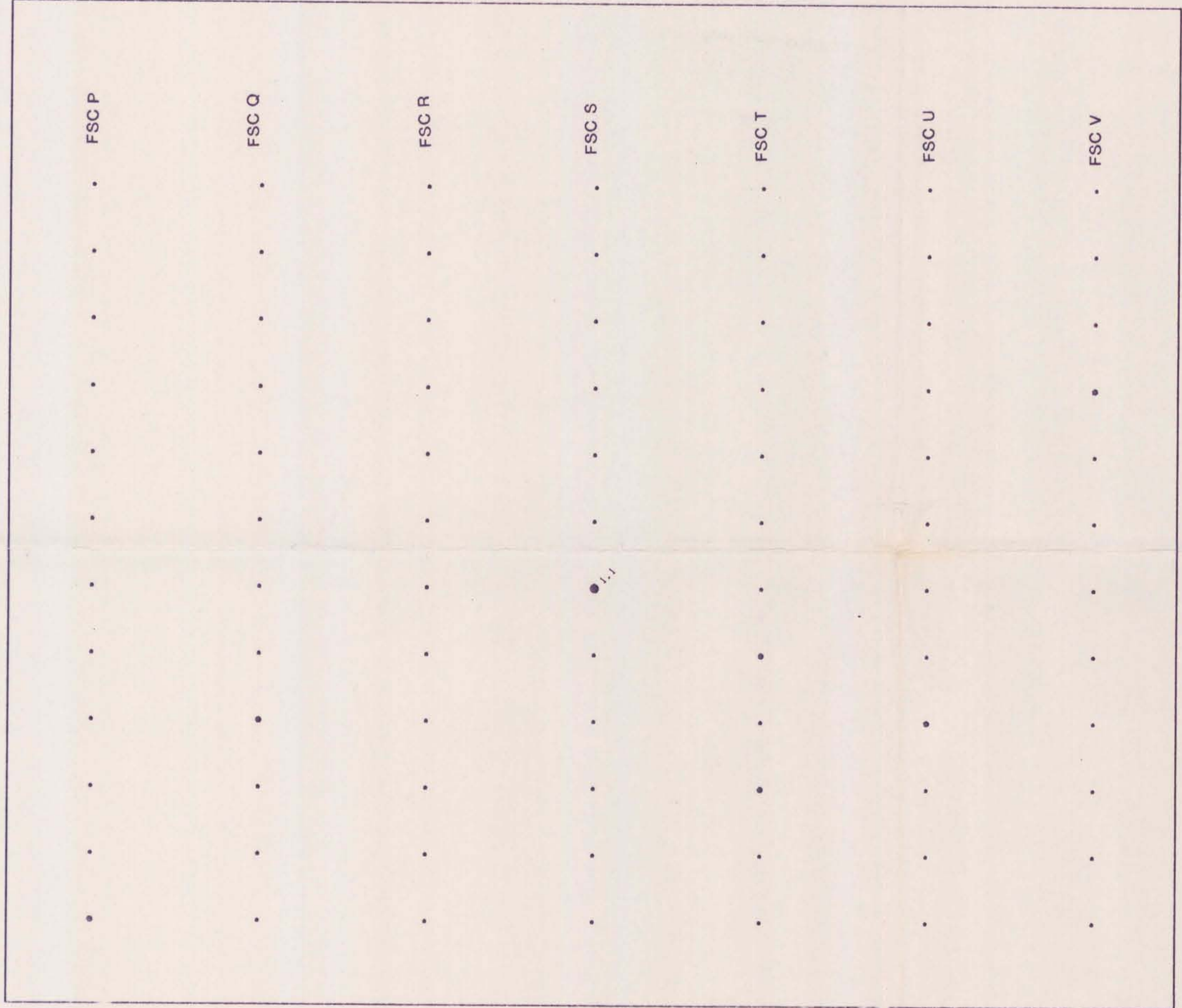


Figure 17b

DRAWN		MG	PLACER DOME INC.	
DATE		90:01:25	FORS PROPERTY	
SCALE		1:2500	GOLDHILL SOIL GRID	
			ARSENIC IN PPM	
			NO.	PLATE

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FORS PROPERTY  
GOLDHILL SOIL GRID  
SILVER IN PPM

LEGEND

- <0.5 PPM SILVER
- 0.5 - 0.9
- >1.0 PPM SILVER



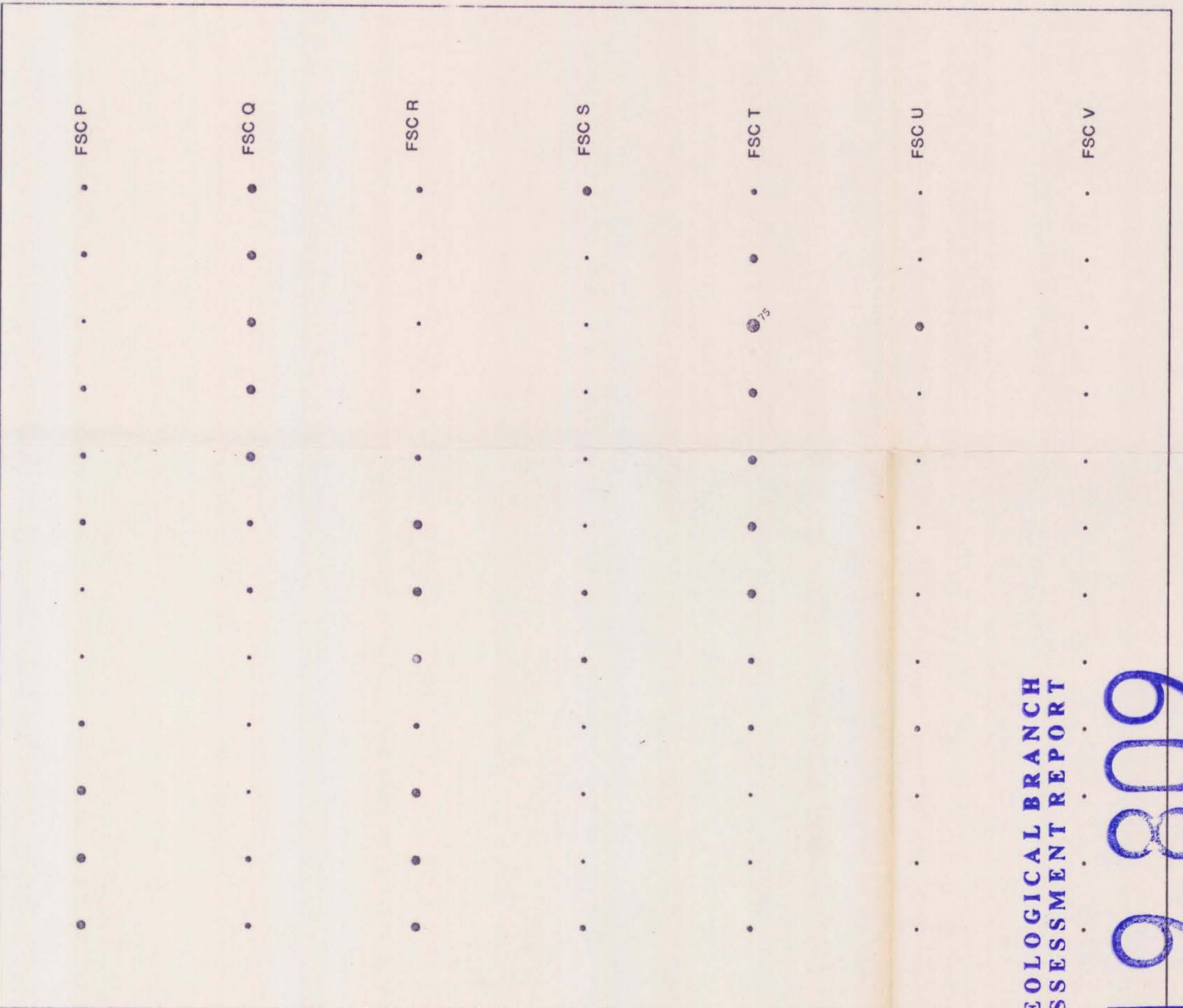
DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/GOLDHILL

	FIELD	FILE
POINTS:	AG	LOCASY
POINTS:	AG	LOCASY



Figure 18a

DRAWN MG		<b>PLACER DOME INC.</b> FORS PROPERTY GOLDHILL SOIL GRID SILVER IN PPM
DATE 90:01:25		
SCALE 1:2500		
NO.	PLATE	



FORS PROPERTY  
GOLDHILL SOIL GRID  
GOLD IN PPB

LEGEND

- <5 PPB GOLD
- 5 - 19
- 20 - 49
- 50 - 99
- >100 PPB GOLD



DATA PLOTTED ON THIS MAP:  
DIRECTORY: 8EXPL/FORS/GCHM/GOLDHILL

	FIELD	FILE
POINTS:	AU1	LOCASY
POINTS:	AU1	LOCASY



Figure 18b

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DRAWN MG		<b>PLACER DOME INC.</b> FORS PROPERTY GOLDHILL SOIL GRID GOLD IN PPB
DATE 90:01:25		
SCALE 1:2500		
NO.	PLATE	