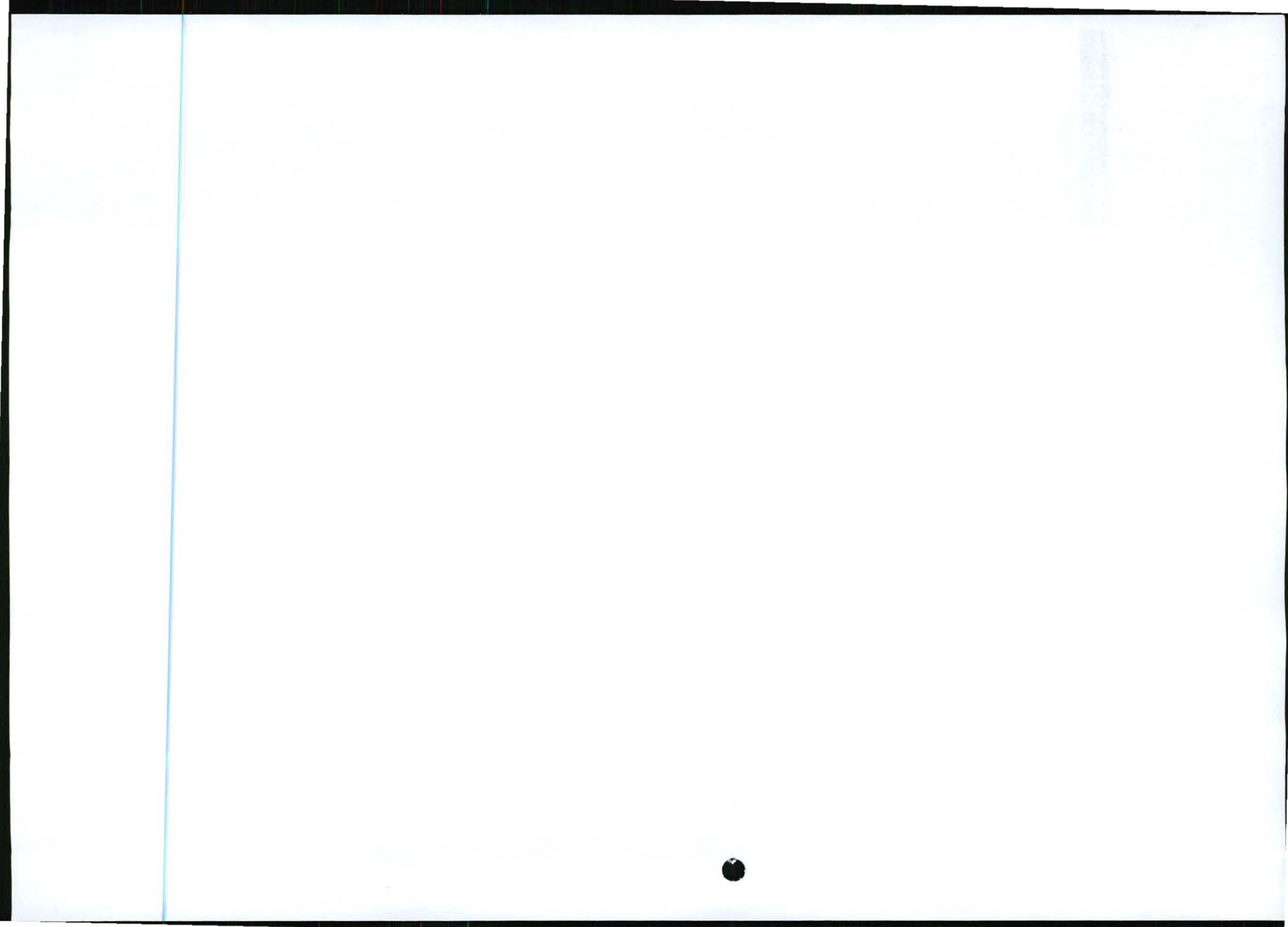
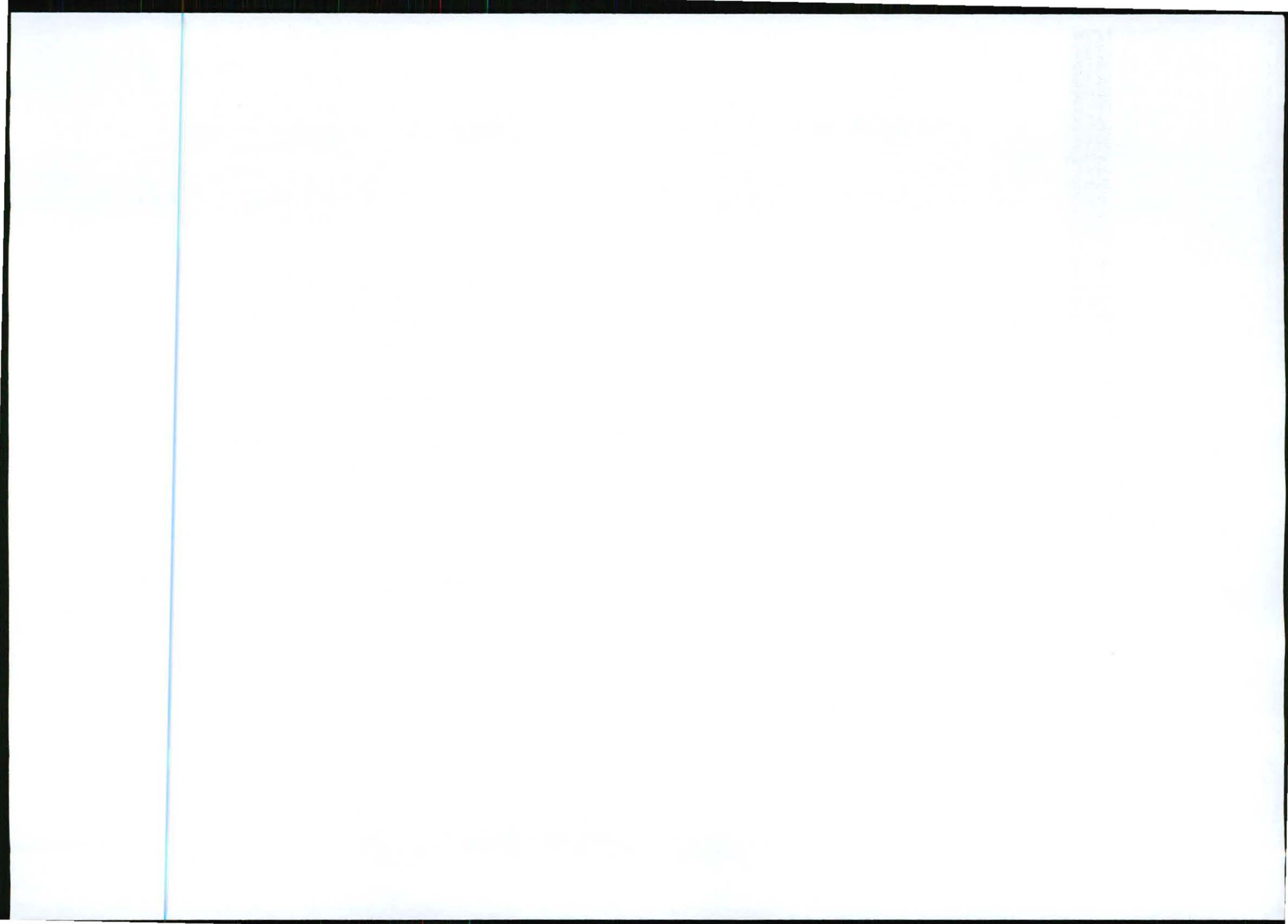


Recovered grade/Yield	The actual grade of ore realised after the mining and treatment process.
Reef	Mineralised lode.
Rehabilitation	The process of restoring mined land to a condition approximating to a greater or lesser degree its original state. Reclamation standards are determined by the Department of Mineral and Energy Affairs and address ground and surface water, topsoil, final slope gradients, waste handling and re-vegetation issues.
Sample	The removal of a small amount of rock pertaining to the deposit which is used to estimate the grade of the deposit and other geological parameters.
Sampling	Taking small pieces of rock at intervals along exposed mineralisation for assay (to determine the mineral content).
Sedimentary	Formed by the deposition of solid fragmental or chemical material that originates from weathering of rocks and is transported from a source to a site of deposition.
Slimes dam	A storage facility for all fine waste products from the processing plant.
Specific gravity/S.G.	Measure of quantity of mass per unit of volume, density.
Stockpile	A store of unprocessed ore or marginal grade material.
Stripping	Removal of waste overburden covering the mineral deposit.
Stripping ratio	Ratio of ore rock to waste rock.
Subduction	The movement of one crustal plate (lithospheric plate) under another so that the descending plate is "consumed".
Tailings	The waste products of the processing circuit. These may still contain very small quantities of the economic mineral.
Tailings dam	Dams or dumps created from waste material from processed ore after the economically recoverable metal or mineral has been extracted.
Tonnage	Quantities where the tonne is an appropriate unit of measure. Typically used to measure reserves of metal-bearing material in-situ or quantities of ore and waste material mined, transported or milled.
Trenching	Making elongated open-air excavations for the purposed of mapping and sampling.
Trust Fund	A fund required by law to be set up, to which annual contributions are paid so that the remaining environmental liability of the operation is covered.
Veins	A tabular or sheet like body of one or more minerals deposited in openings of fissures, joints or faults, frequently with associated replacement of the host rock.
Yield/Recovered grade	The actual grade of ore realised after the mining and treatment process.



Appendix 20: List of Abbreviations

amsl	Above mean sea level
AusIMM	Australian Institute of Mining and Metallurgy
ASX	Australian Stock Exchange
AUD	Australian Dollar
BEE	Black Economic Empowerment
BFS	Bankable Feasibility Study
bn	billion
CGS	Council for Geosciences
cmg/t	centimetre grams per tonne
CPR	Competent Persons Report
DFS	Definitive Feasibility Study
EMPR	Environmental Management Program Report
DMR	Department of Minerals and Resources
EMP	Environmental Management Plan
GIS	Geographic Information Systems
g/t	grams per tonne
GBP	Great British Pounds
GKZ	Geological Committee for reserves
ha	hectares
IP	Inverse Polarity Survey
JORC	Joint Ore Reserves Committee
JSE	JSE Limited
LoM	Life of Mine
m	metres
my	million years
MAICD	Member of Australian Institute of Company Directors
MAIG	Australian Institute of Geoscientists
MMRS	Mineral and Mining Reclamation Services
MPRDA	Mineral and Petroleum Resources Development Act
MPRRA	Mineral and Petroleum Resources Royalty Act
pa	per annum
PFS	Pre Feasibility Study
PR	Prospecting Right
SAIMM	South African Institute of Mining and Metallurgy
SAMREC	South African Mineral Resources Code
t	tonnes
RC	Reverse circulation
USD	American Dollar
ZAR	South African Rand



Appendix 21: South African Mining and Environmental Law

MINERAL AND PETROLEUM RESOURCES DEVELOPMENT ACT (MPRDA)

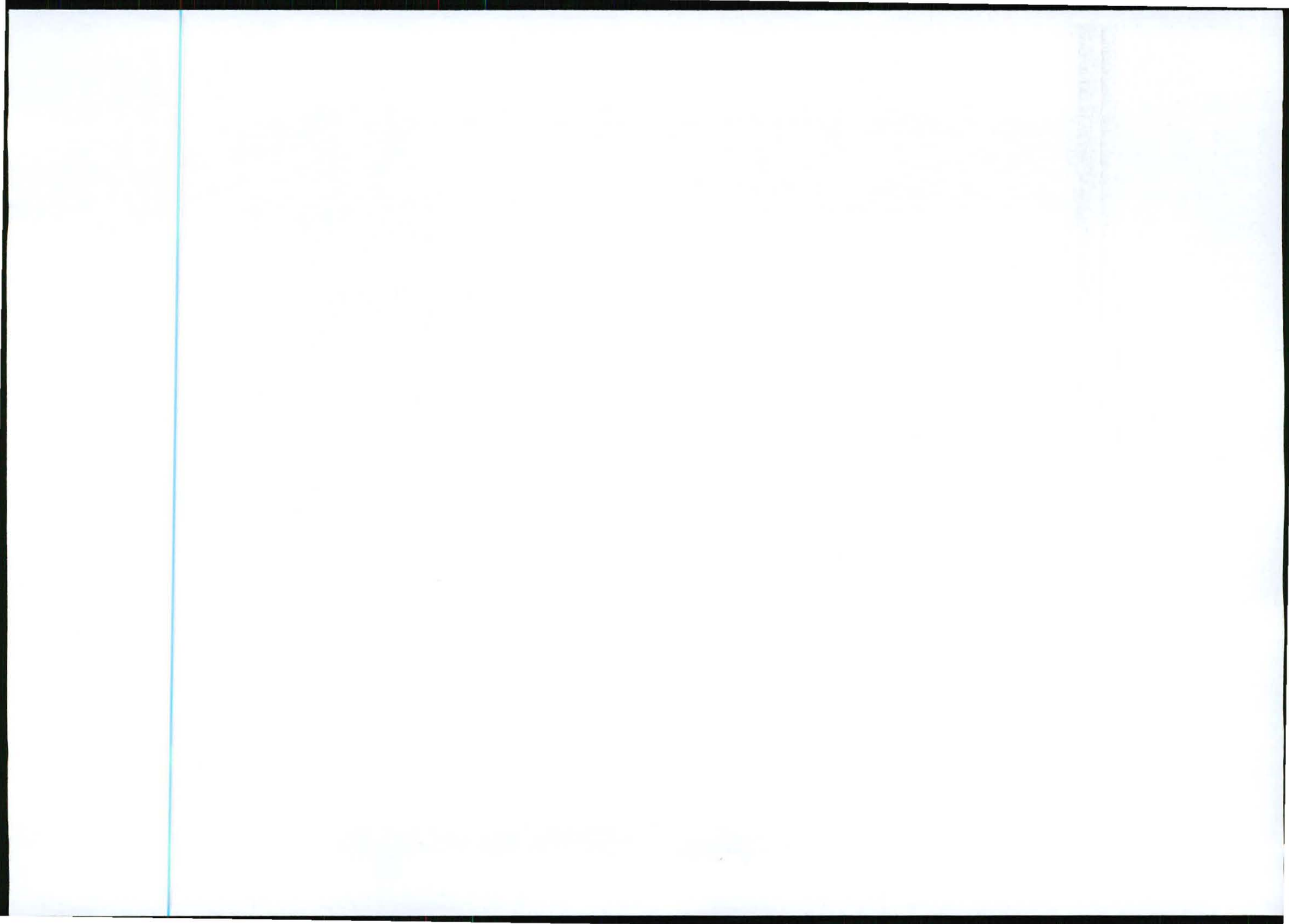
The South African Government enacted the MPRDA on the 1st May 2004. It defines the State's legislation on mineral rights and mineral transactions in South Africa. The Act emphasises that the government did not accept the existence of the historical dual State and private ownership of mineral rights in South Africa and, as such, the Act legislated that all mineral and petroleum resources in South Africa now vest in the State. Additional objectives of the Act include the promotion of economic growth, the development of resources to expand opportunities for the historically disadvantaged, and the socio-economic development of the areas in which mining and prospecting companies are operating. It also provides for security of tenure relating to prospecting, exploration, mining and production.

A further objective of the Act was to further BEE within South Africa's minerals industry, by encouraging mineral exploration and mining companies to enter into equity partnerships with BEE companies. The Act also makes provision for the implementation of social responsibility procedures and programmes by mineral resource companies.

The Act incorporated a "use-it or lose-it" principle, that has been applied to companies or individuals who owned mineral rights or the rights to prospect and mine prior to 2004 (Old Order Rights). These Old Order Rights were required to be transferred within specified timeframes, under the provisions of the Act, into New Order Rights to prospect and mine. Once the State has granted the conversion of the Old Order Rights to New Order Rights, or has granted a New Order Right to new applications submitted after the implementation of the MPRDA, a Notarial Agreement between the State and the holder of the New Order Right is entered into. This Agreement sets out all the conditions associated with the New Order Right. New Order Rights can be suspended or cancelled by the Minister if, upon notice of a breach from the Minister of its obligations to comply with the MPRDA, or the conditions prescribed as part of its New Order Right, a breaching entity fails to rectify such a breach.

In addition, in terms of the MPRDA, mining and exploration companies have to comply with additional responsibilities relating to environmental management and to environmental damage, degradation or pollution, resulting from their prospecting or exploration activities. Types of rights and permits applicable to the mining industry in South Africa, as provided for in the MPRDA, are detailed below.

LICENCE TYPE	PURPOSE	DURATION	REQUIREMENTS	CONDITIONS
Reconnaissance Permission	Exploration at the reconnaissance stage.	2 years (non renewable)	Financial ability; technical ability; and work programme.	Holder does not have the exclusive right to apply for a Prospecting Right.
Prospecting Right	Exploration at target-definition stage.	Up to 5 years initially. Renewable once for 3 years.	Financial ability; technical ability; economic programme; work programme; and environmental plan.	Payment of Prospecting fees. Holder has the exclusive right to apply for a Mining Right
Retention Permit	Hold on to legal rights between prospecting and mining stages.	3 years initially. Renewable once for 2 years.	Prospecting stage complete; feasibility study complete; project not currently feasible; and completed Environmental Management Plan (EMP).	May not result in exclusion of competition, unfair competition or hoarding of rights. May not be transferred, ceded, leased, sold, mortgaged or encumbered in any way.
Mining Right	Development and production stage.	30 years initially. Renewable for further periods of 30 years. Effective for LoM.	Financial ability; technical ability; prospecting complete; economic programme; work programme; social plan; labour plan; and completed EMP.	Payment of royalties (from 2010). Compliance with Mining Charter and Codes of Good Practice on broad-based BEE (BBBEE.)
Mining Permit	Small-scale mining.	2 years initially. Renewable for 3 further periods of 1 year at a time.	Life of project must be <2 years; areas must be <1.5Ha; and completed EMP.	Payment of royalties (from 2010). May not be leased or sold, but can be mortgaged.



Broad-based Socio-Economic Charter

Promulgation of the Broad-based Socio-Economic Charter for the South African Mining Industry (also known as the Mining Charter) marked the end of protracted debates and varying interpretations of the legislation's requirements, paving the way for the full implementation of the MPRDA.

All mining and prospecting companies are required to comply with the provisions of the Mining Charter. The objectives of the Mining Charter are to:-

- promote equitable access to the State's mineral resources by all the people of South Africa. It required that every mining company achieved a 15% level of ownership of its mining assets by historically disadvantaged South Africans (HDSAs) by the 1st May 2009, and a level of 26% ownership by the 1st May 2014;
- substantially and meaningfully expand opportunities for HDSAs, including women, to enter the mining and minerals industry and to benefit from the exploitation of the nation's mineral resources. In terms of this requirement, 40% of management roles are to be held by HDSAs by 2010;
- expand the skills base of HDSAs to serve the community;
- promote employment and advance the social and economic welfare of mining communities, and the major areas from which labour is drawn to carry out exploration or mining; and
- promote the beneficiation of South Africa's mineral commodities, whereby the companies which have facilitated downstream, value-adding activities, for products they mine, could achieve an "offset" against the HDSA equity participation requirement.

Most mining companies are already implementing their own empowerment strategies. These strategies demonstrate their best endeavours to consider the issues and a willingness to accommodate the requirements when they are finally defined.

Compliance with the Mining Charter will be measured using a designated scorecard, which provides a practical framework against which the Minister can assess whether a company actually measures up to what was intended in the MPRDA and the Mining Charter.

Promotion of Beneficiation Bill

This is still being prepared, and is expected to provide incentives for upstream companies that facilitate downstream investments, in order to reduce the exporting of unprocessed mineral products and to promote local value addition.

MINERAL AND PETROLEUM RESOURCES ROYALTY ACT (MPRRA)

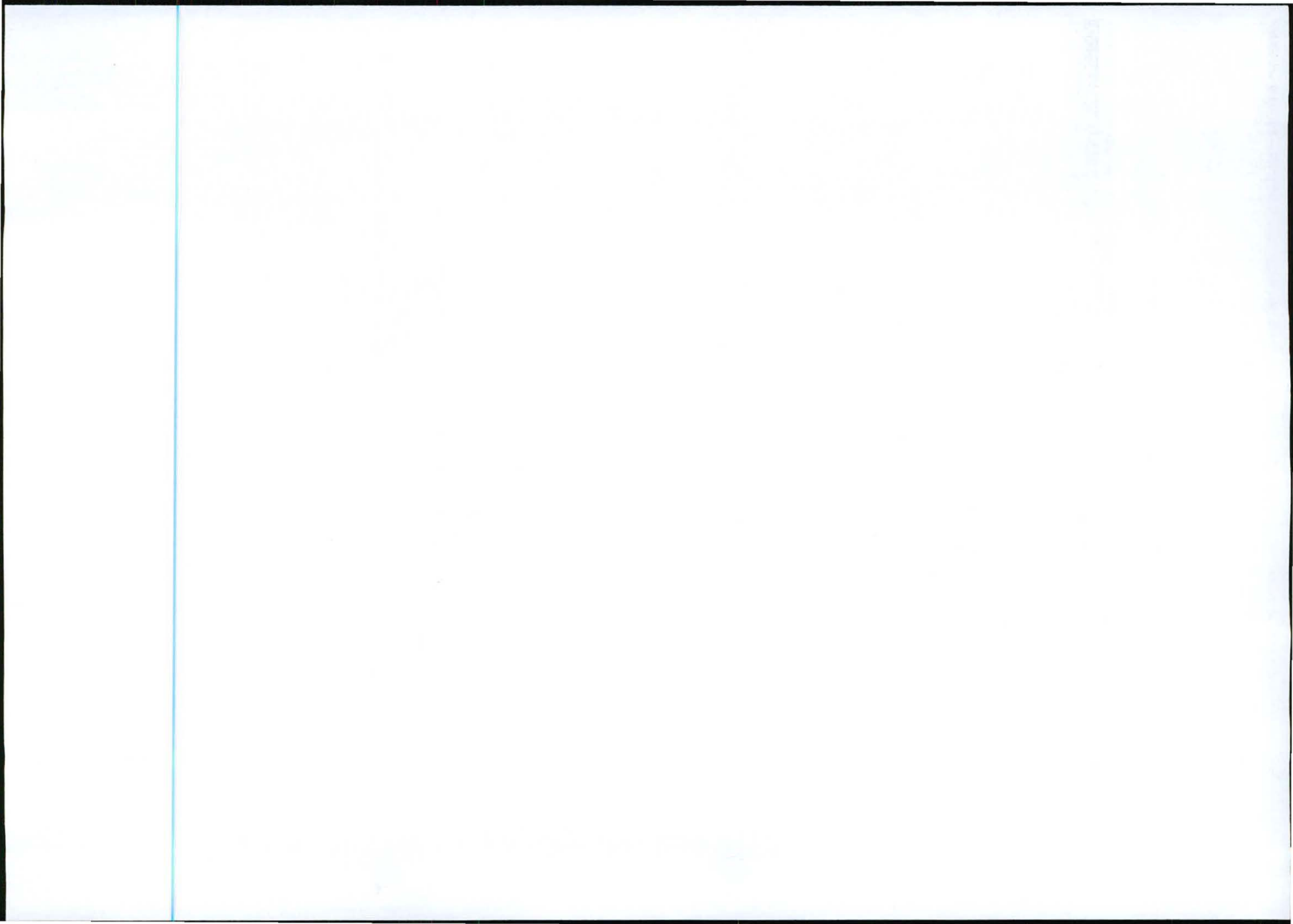
This piece of legislation incorporates the government's intention to impose royalties on revenues derived from mineral production in South Africa. Enacted in 2008, the Minerals and Petroleum Resources Royalty Act (MPRRA) was initially set to be implemented in May 2009. However, in an effort to mitigate job losses in the mining sector, the government decided to postpone the implementation of the new mineral and mining royalty regime until March 2010. The main purpose of the Act was to provide legislation for the collection of royalties from mines, developed and operated in terms of the New Order Mineral Rights, granted through the MPRDA process.

There are a number of problems with the administration of the Act, in that it needs to be linked to existing tax legislation, which clearly defines mining and industrial tax rates based on a profitability formula. The intention is not to facilitate double taxation on an already burdened industry.

The Act distinguishes between refined and unrefined mineral resources, where refined minerals have been refined beyond a condition specified by the Act, and unrefined minerals have undergone limited beneficiation as specified by the Act.

The royalty is determined by multiplying the gross sales value of the extractor, in respect of that mineral resource, in a specified year, by the percentage determined by the royalty formula.

Both direct operating expenditure (Opex) and capital expenditure (Capex) incurred is deductible for the determination of earnings before interest and tax (EBIT). The quantum of the revenue royalty on all minerals is dependent on the profitability of the company based on the following formula. For Refined Mineral Resources the formula is:-



$$\text{Royalty Rate} = 0.5 + \frac{\text{EBIT}}{\text{Gross Sales (refined)} \times 12.5} \times 100$$

The maximum percentage for Refined Mineral Resources is 5%.

For Unrefined Mineral Resources the formula is:-

$$\text{Royalty Rate} = 0.5 + \frac{\text{EBIT}}{\text{Gross Sales (unrefined)} \times 9} \times 100$$

The maximum percentage for Unrefined Mineral Resources is 7%.

The Royalty payments on the Evander and Jeanette projects will apply when the cumulative cash-flow of the projects becomes positive.

TAXATION

In addition to the Royalty payment detailed above, the Evander and Jeanette projects will be subject to corporate taxation. The corporate tax rate applicable to the Evander and Jeanette projects is 28% and will apply when the cumulative cash flow of the projects becomes positive.

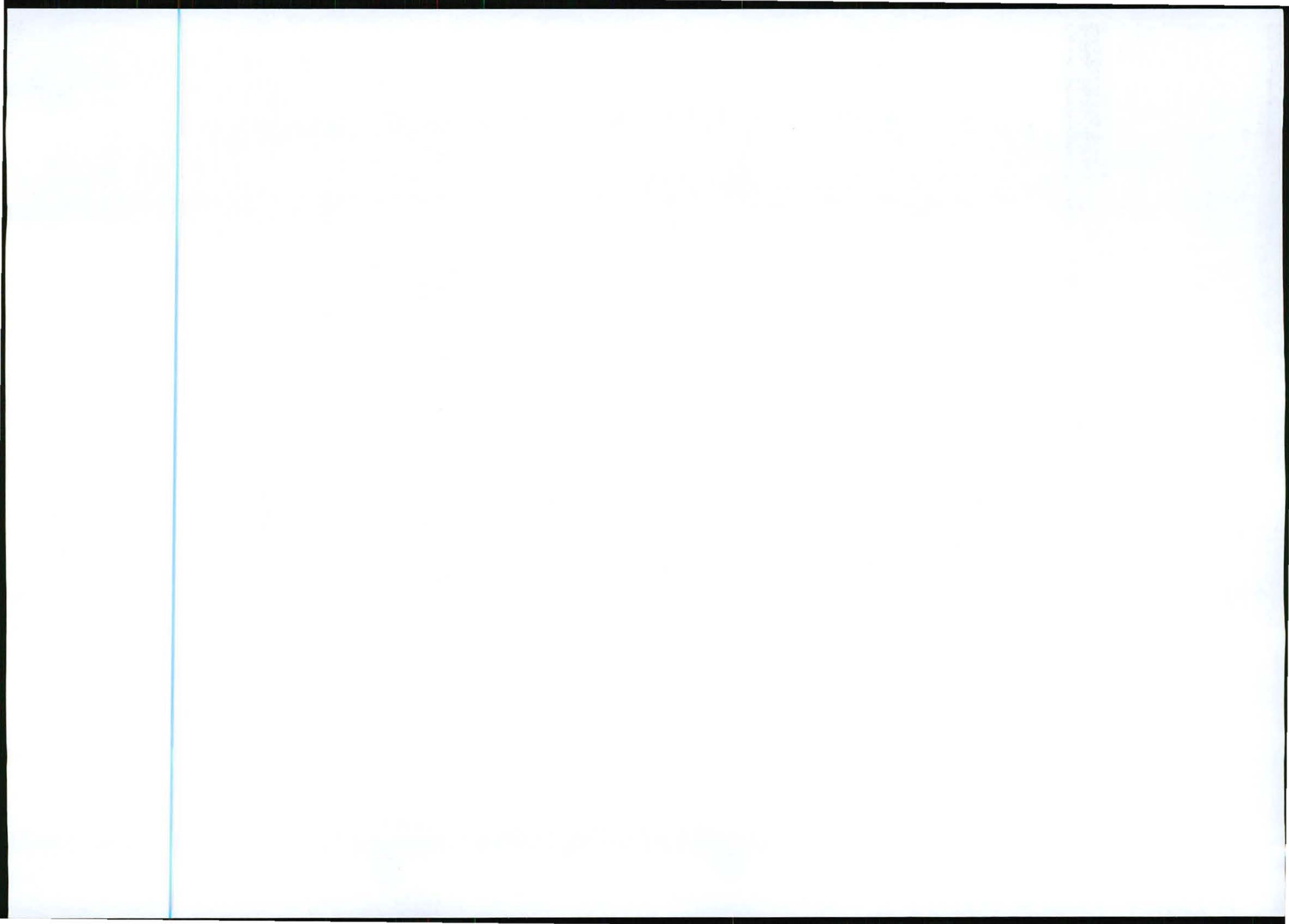
GENERAL ENVIRONMENTAL PERMITTING AND STANDARDS

Key environmental legislation, applicable in South Africa, is as follows:-

- National Environmental Management Act (107 of 1998) ('NEMA') as regulated by the Department of Environmental Affairs and Tourism ('DEAT') and relevant Provincial Departments of Environment;
- MPRDA as regulated by the DMR. The MPRDA replaces the Minerals Act, 1991 and makes provision for equitable access to, and sustainable development of, South Africa's mineral and petroleum resources.
- Regulations under the MPRDA set out the procedures for undertaking EIA's;
- The MPRDA also requires a Social and Labour Plan ('SLP'), a mine works plan ('MWP'), proof of technical and financial competence as well as an approved Environmental Management Plan ('EMP'); and
- Mine Health and Safety Act (Act 29 of 1996) as regulated by the DMR. This Act deals with the protection of the health and safety of persons in the mining industry but also has implications for environmental issues related to environmental health monitoring within mines.

Additional relevant legislation includes the following:-

- National Water Act (36 of 1998) ('NWA') as regulated by the Department of Water Affairs ('DWA');
- Atmospheric Pollution Prevention Act (45 of 1965) ('APPA') as regulated by DEAT;
- Environment Conservation Act (73 of 1989) ('ECA') as regulated by the DEAT, DWAE and relevant Provincial Departments;
- National Heritage Resources Act (25 of 1999) as regulated by South African Heritage Resource Agency ('SAHRA') or relevant Provincial Departments where established;
- Hazardous Substances Act (15 of 1973) as regulated by the Department of Health;
- Forest Act (84 of 1998), Provincial Nature Conservation Acts and other Ordinances as regulated by Provincial conservation authorities; and
- National Nuclear Regulatory Act of 1999 as regulated by the National Nuclear Regulator ('NNR'). This legislation has been replaced by the Certificate of Registration ('COR') system.



Appendix 22: Qualified Persons Certificate

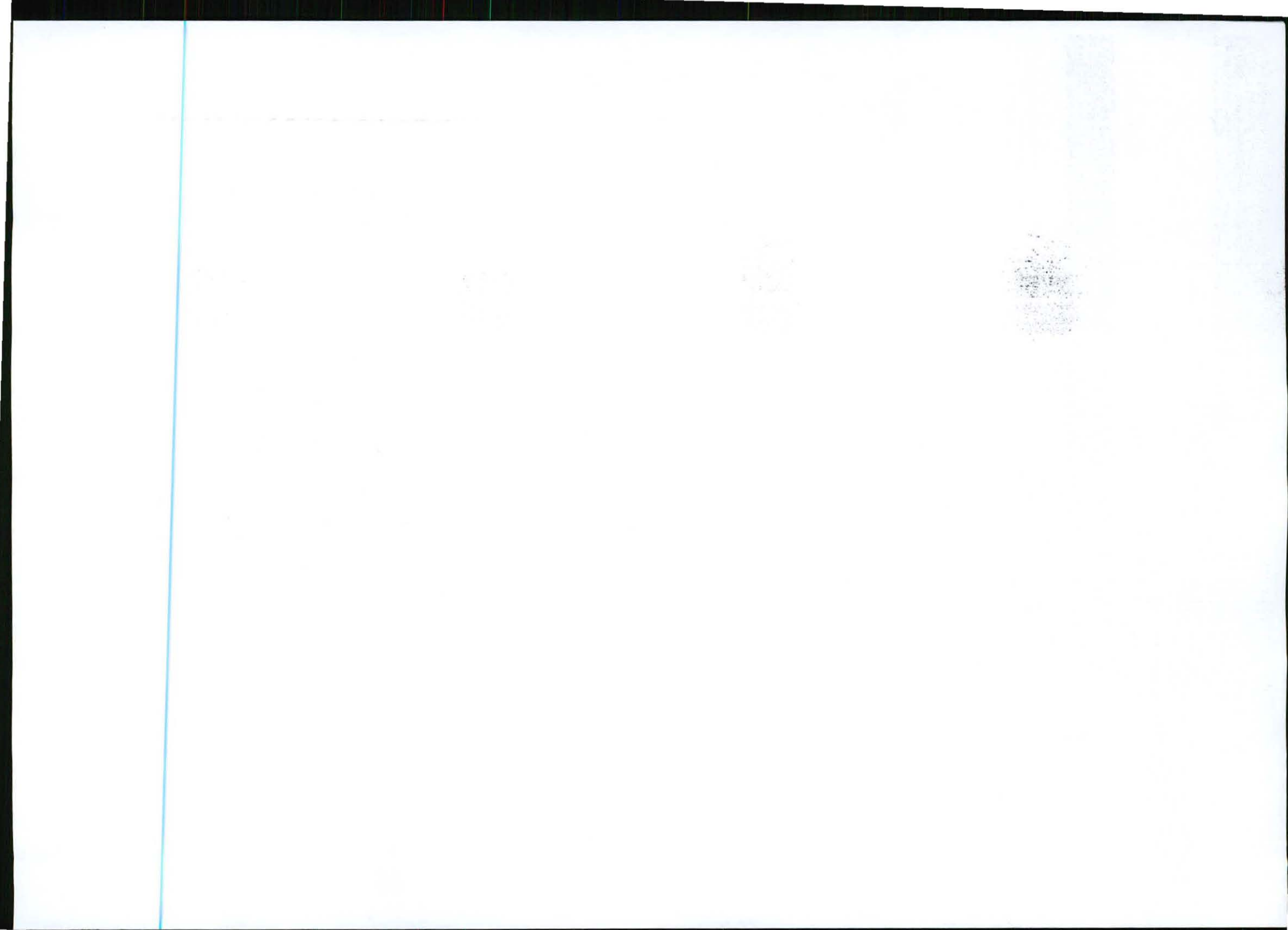
GERT A. DU PLESSIS

I, Gert A. Du Plessis, B.Sc./GDE.Eng., as an author of this report entitled "Technical Report for the Madonsi Project" prepared for HectoCorp (Pty) Ltd and Domino and dated 25 February 2011, do hereby certify that:

1. I am currently employed by:
 - Taung Gold Limited
 - Ground Floor Block C
 - Little Fourways Office Park
 - 1 Leslie Avenue East
 - Fourways, 2055
2. I am a graduate of North West University of South Africa in 1981 with a B.Sc Geology & Pedology and Graduate Diploma in Engineering (GDE) from Witwatersrand University of South Africa in 2000.
3. I am a member in good standing of the South African Council for Natural Scientific Professions (SACNASP), registration number 400263/04.
4. I have worked as a South African mining geologist for a total of 19 years since my graduation, when-after I consulted in the mineral resources management industry for 4 years. I worked in the capacity of an Exploration Consulting Manager from 2004 until 2008 when I joined Taung Gold as the company's COO Technical.
5. I have read the definition of "qualified person" set out in National Instrument 43-101 (NI43-101) and certify that by reason of my education, affiliation with a professional association (as defined in NI43-101) and past relevant work experience, I fulfill the requirements to be a "qualified person" for the purposes of NI43-101.
6. I worked on the Madonsi Project area intensively for several months during 2004/5 and revisited the properties in December 2010, leading up to the compilation of the report referenced herein.
7. I am responsible for preparation of the "Technical Report for Madonsi Project".
8. I am independent of the Issuer, HectoCorp (Pty) Ltd and Domino (Pty) Ltd, applying the test set out in Section 1.4 of National Instrument 43-101.
9. I have had no prior involvement with the property that is the subject of the Technical Report other than the work performed in 2004/5.
10. I have read National Instrument 43-101F1, and the Technical Report has been prepared in compliance with National Instrument 43-101 and Form 43-101F1.
11. To the best of my knowledge, information, and belief, the Technical Report contains all scientific and technical information that is required to be disclosed to make the technical report not misleading.

Dated 25th day of February, 2011

Gert A. Du Plessis, B.Sc./GDE, Pr.SC. Nat

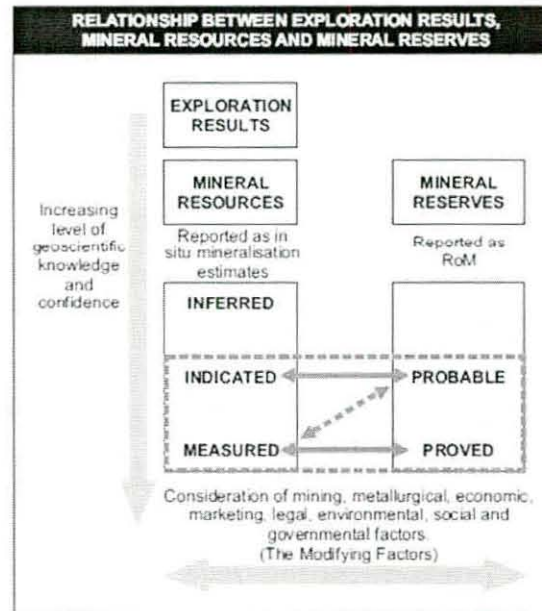


Appendix 1 - Summary of the fundamental principles of the National Instrument 43-101 and SAMREC Code

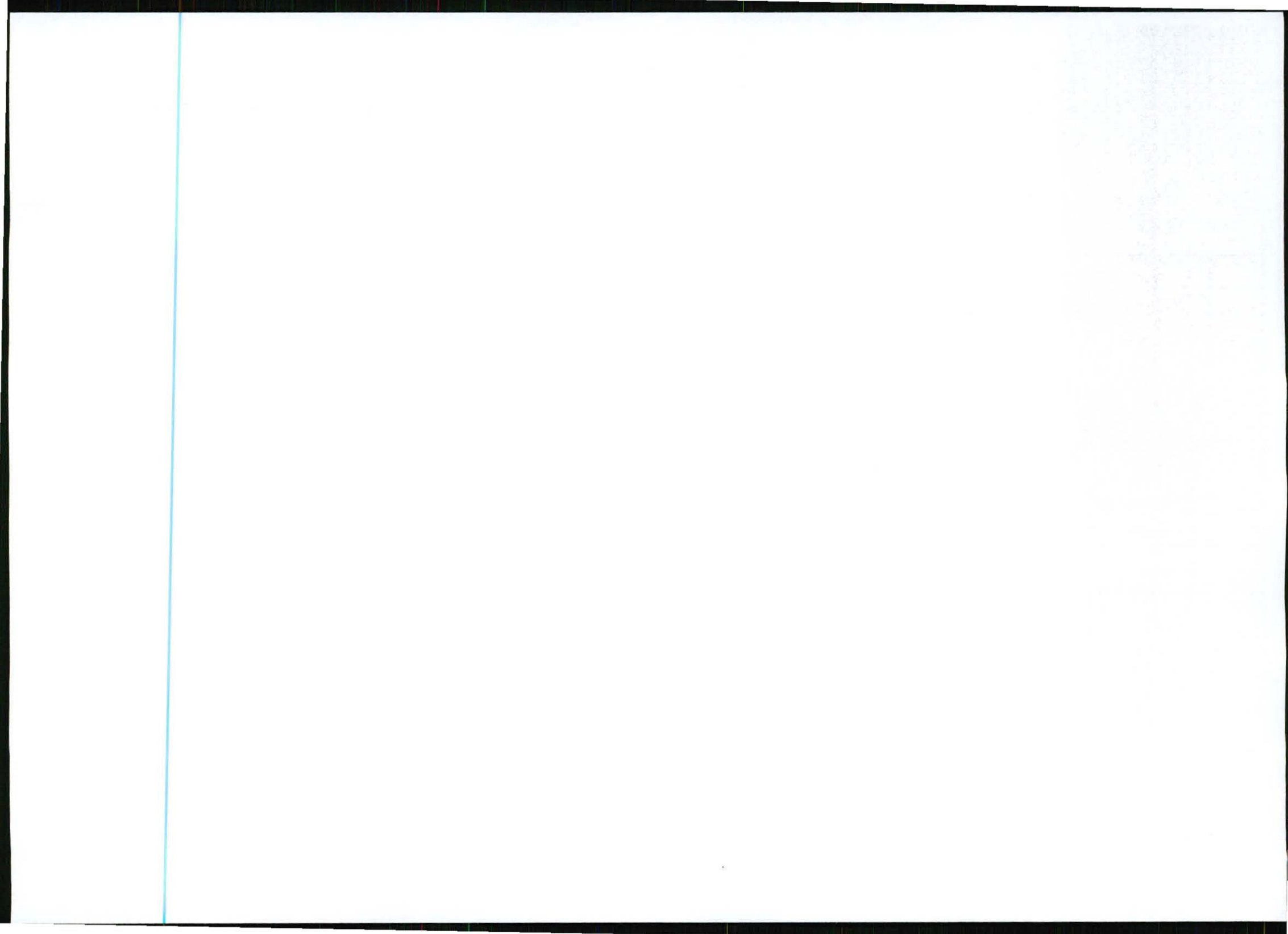
COMPARISON OF INTERNATIONAL REPORTING CODES

SAMREC Code	
T 1	General
T 1.1.1	Purpose of Report
T 1.2	Project Outline
T 1.3	History
T 1.4	Key Plan, Maps and Diagrams
T 1.5	Project Location and Description
T 1.6	Topography and Climate
T 1.7	Legal Aspects and Tenure
T 2	Project Data
T 2.1	Data Management and Database
T 2.2	Spatial Data
T 2.3	Geological Data
T 2.4	Specific Gravity and Bulk Tonnage Data
T 2.5	General Data
T 3	Sampling
T 3.1	Sampling Governance
T 3.2	Sample Method, Validation, Capture and Storage
T 3.4	Sample Analysis
T 4	Interpretation/Modelling
T 4.1	Geological Model and Interpretation
T 4.2	Estimation and Modelling Techniques
T 5	Techno-Economic Study
T 5.1	Governmental
T 5.2	Environmental
T 5.3	Social
T 5.4	Mining
T 5.5	Treatment/Processing
T 5.6	Infrastructure
T 5.7	Economic Criteria
T 5.8	Marketing
T 6	Risk Analysis
T 7	Resource and Reserve Classification
T 8	Balanced Reporting
T 9	Audits and Reviews
T 10	Other Material Information

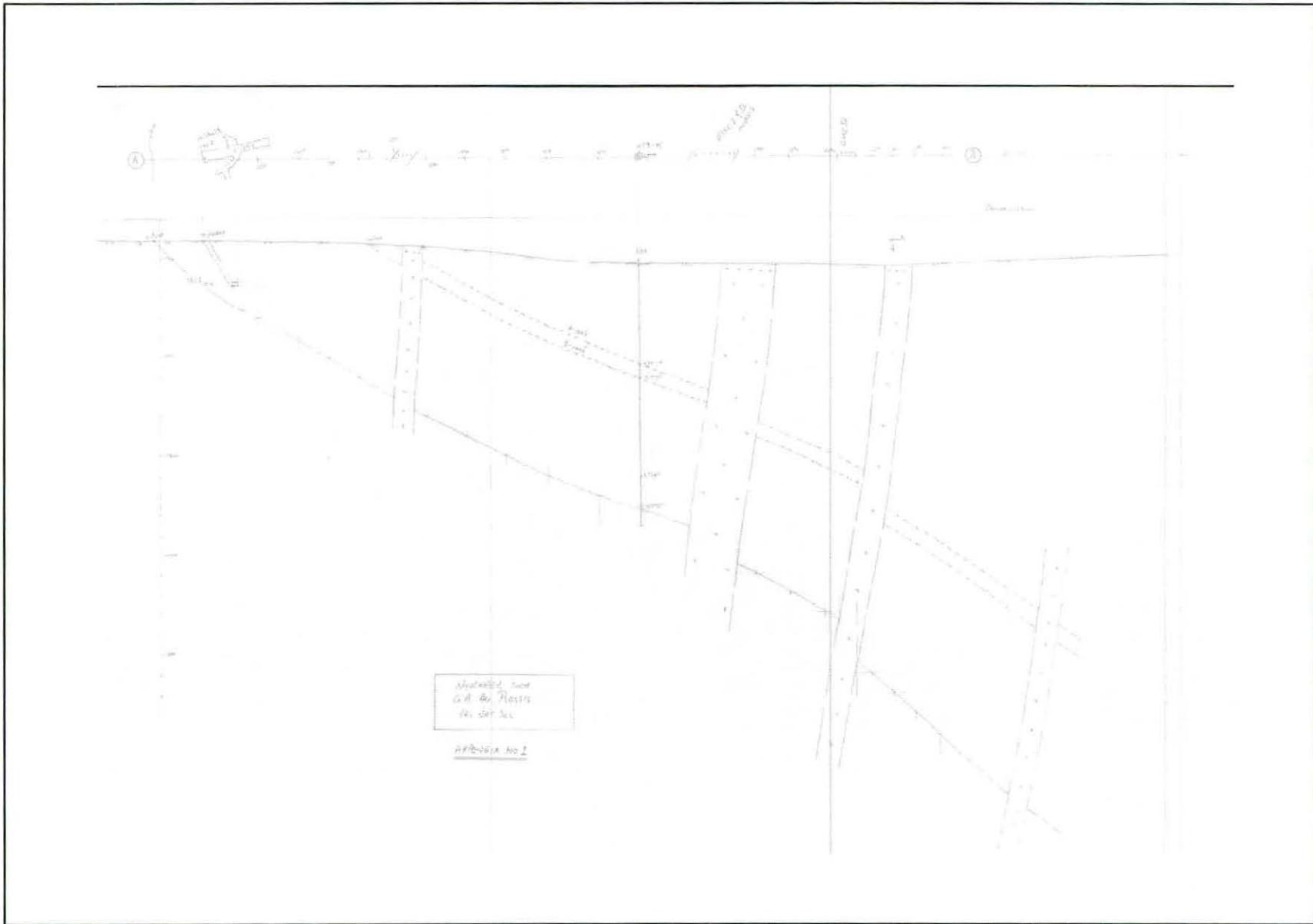
NATIONAL INSTRUMENT 43-101	
Item 1	Title Page
Item 2	Table of Contents
Item 3	Summary
Item 4	Introduction
Item 5	Reliance on Other Experts
Item 6	Property Description, Location
Item 7	Accessibility, Climate, Physiography, Infrastructure etc
Item 8	History
Item 10	Deposit Types
Item 11	Mineralisation
Item 12	Exploration
Item 13	Drilling
Item 14	Sampling Method and Approach
Item 15	Sample Prep. Analysis and Security
Item 16	Data Verification
Item 17	Adjacent Properties
Item 18	Mineral Processing
Item 19	Mineral Resource and Reserves
Item 20	Other Data
Item 21	Interpretations and Conclusions
Item 22	Recommendations
Item 23	References
Item 24	Date and Signature
Item 25	Additional Requirements
Item 26	Illustrations



Source: Venmyn

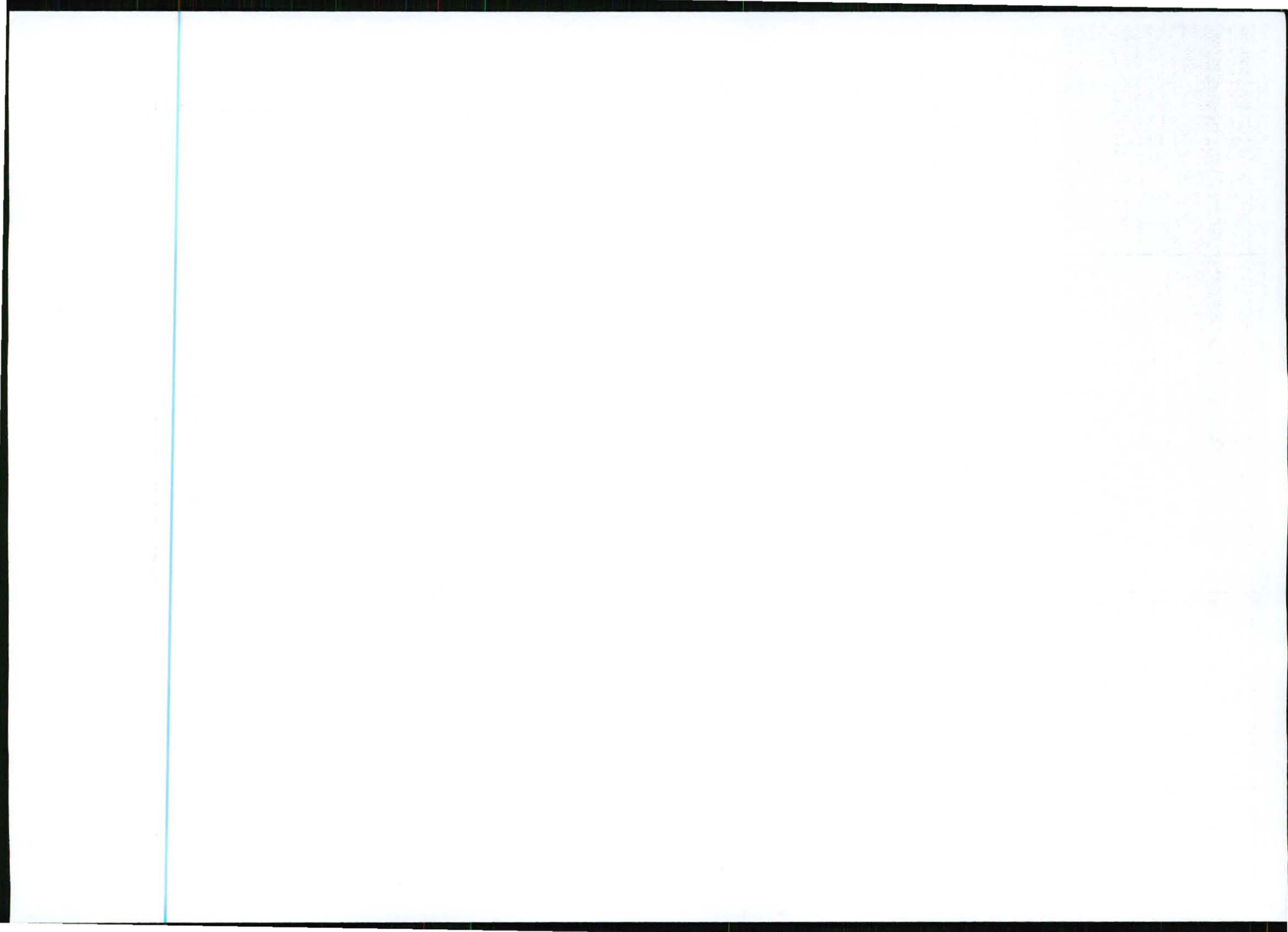


Appendix 2 - Cross-section along line AB (Figure 16)

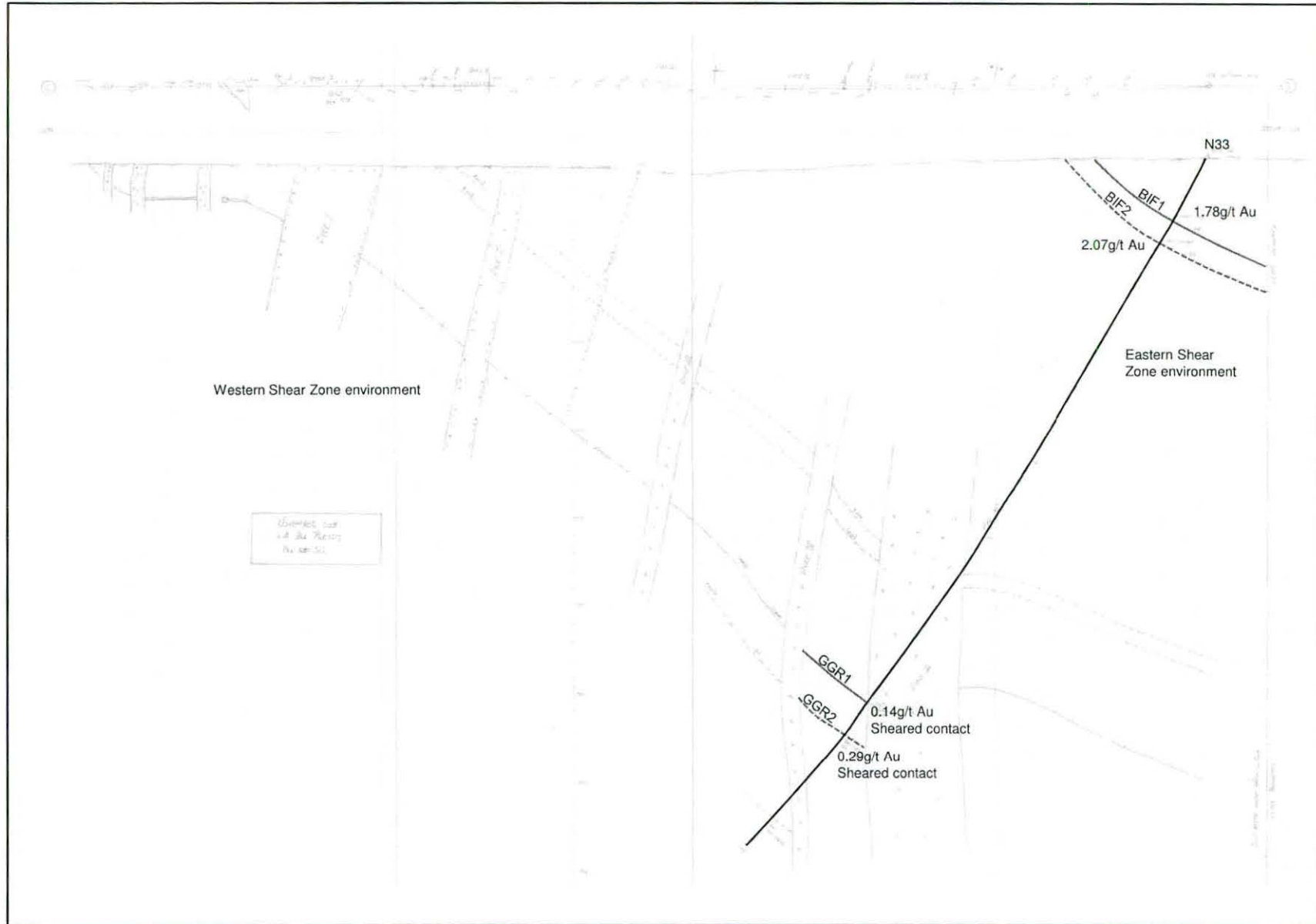


G.A. du Plessis
January 2011

Source: Constructed by the Author (Original available)

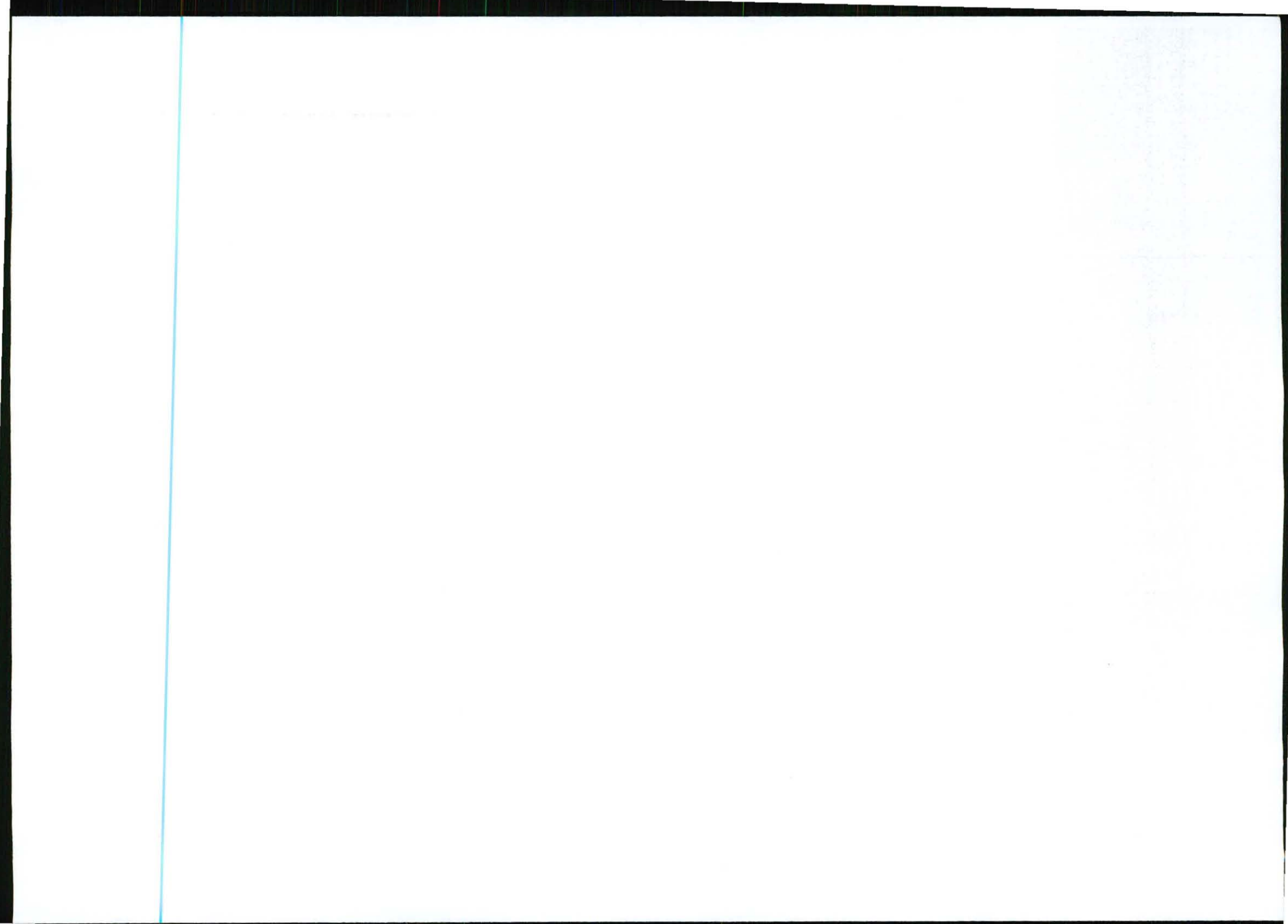


Appendix 3 - Cross-section along line CD (Figure 16)

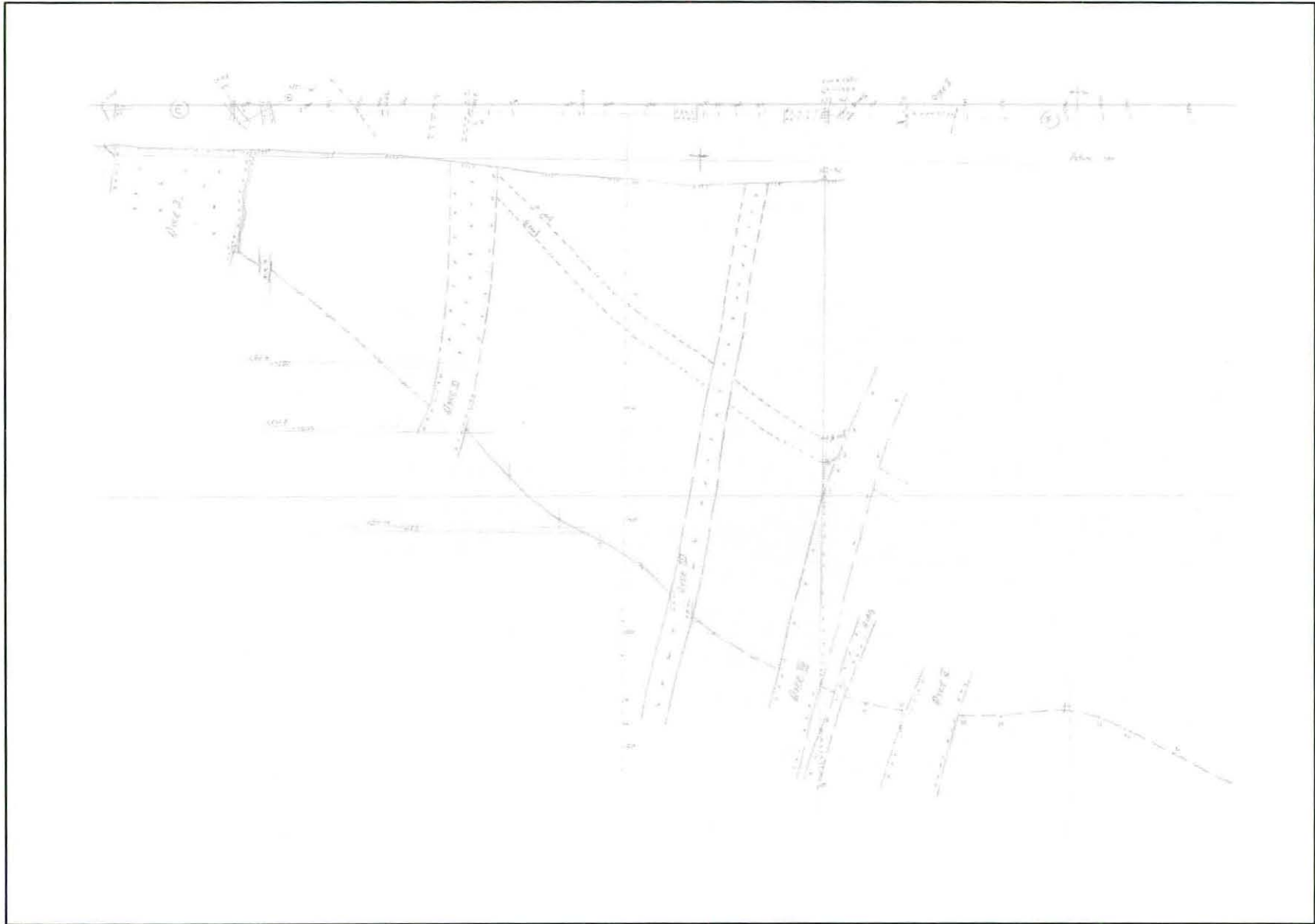


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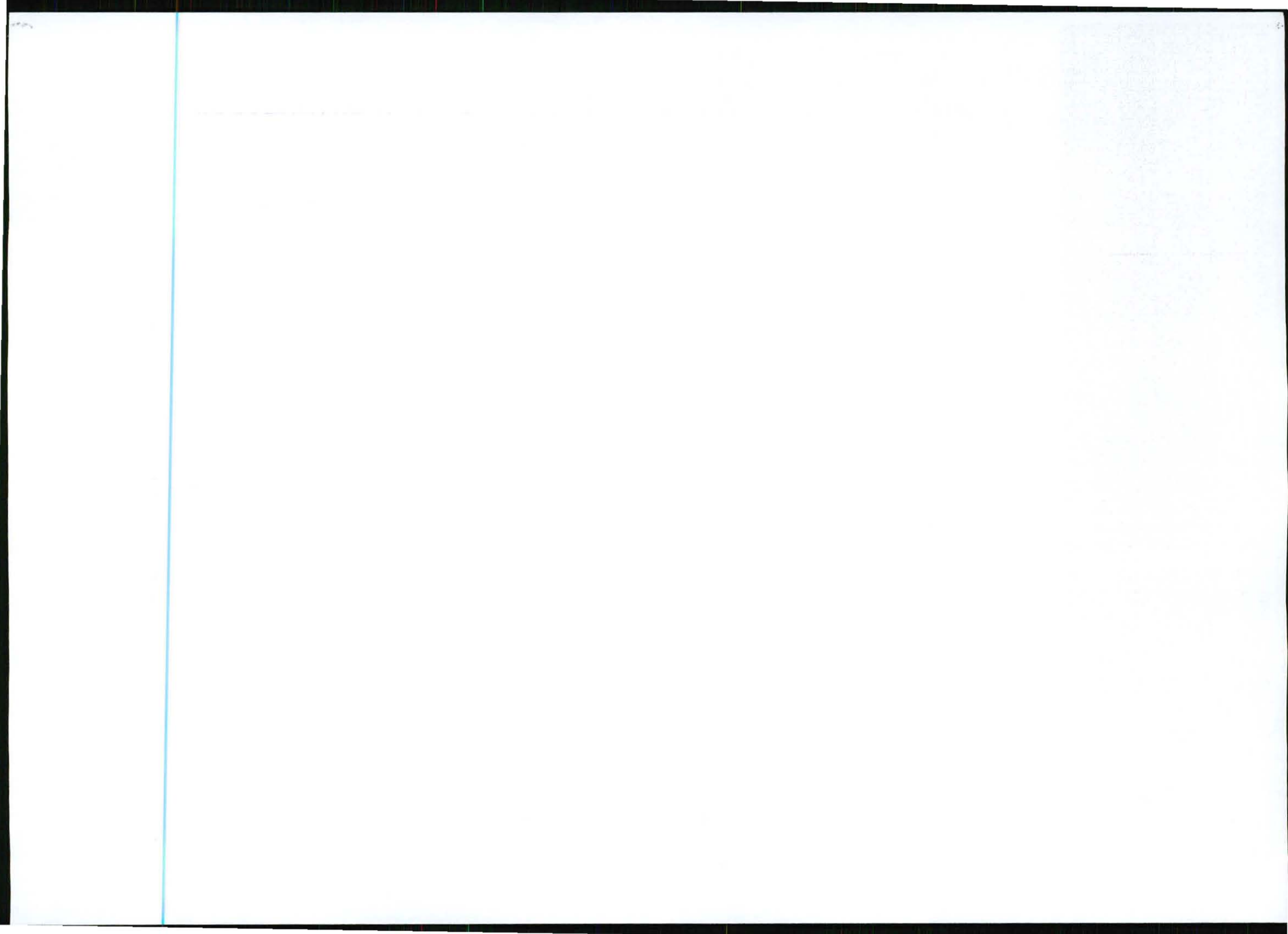


Appendix 4 - Cross-section along line EF (Figure 16)

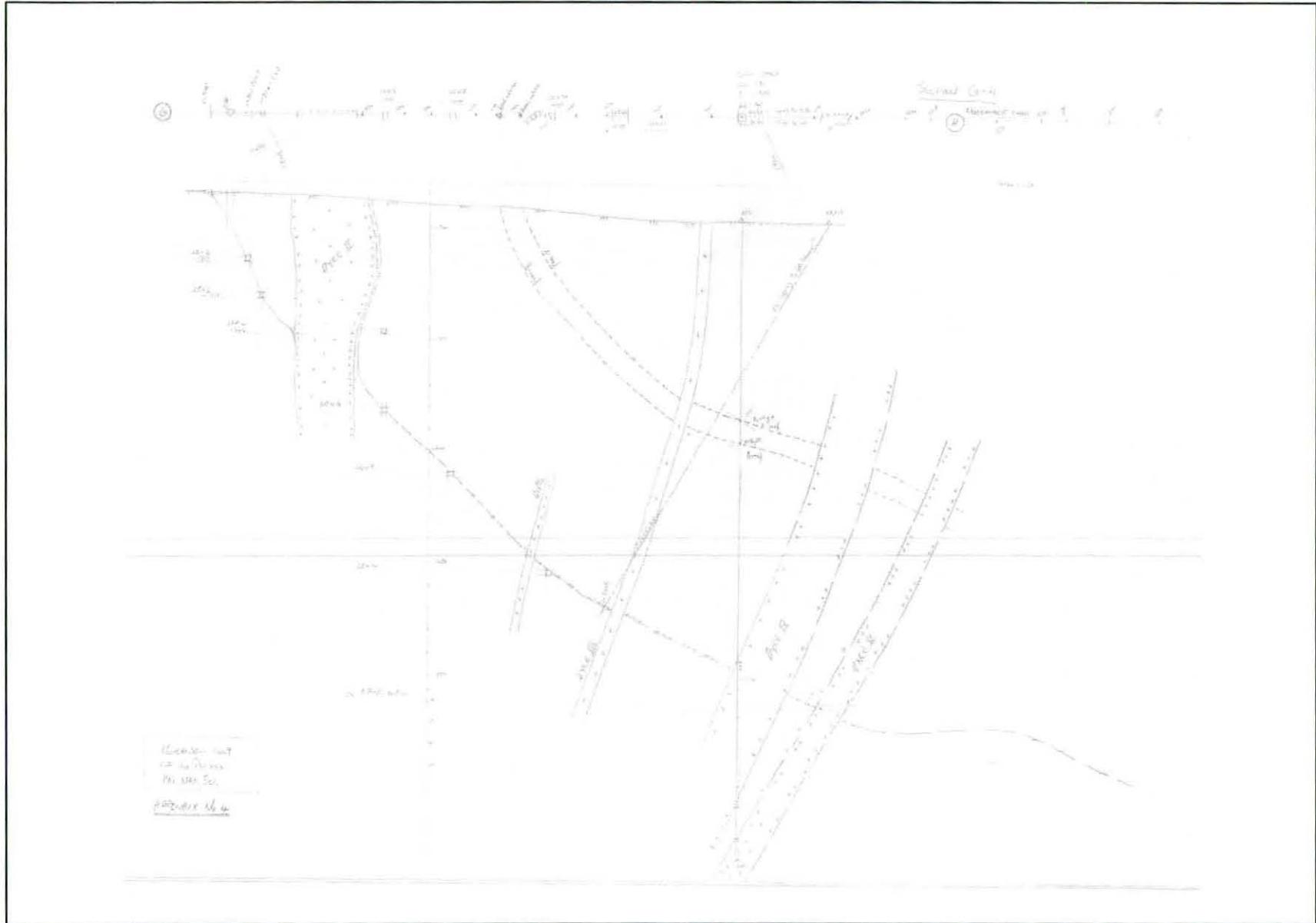


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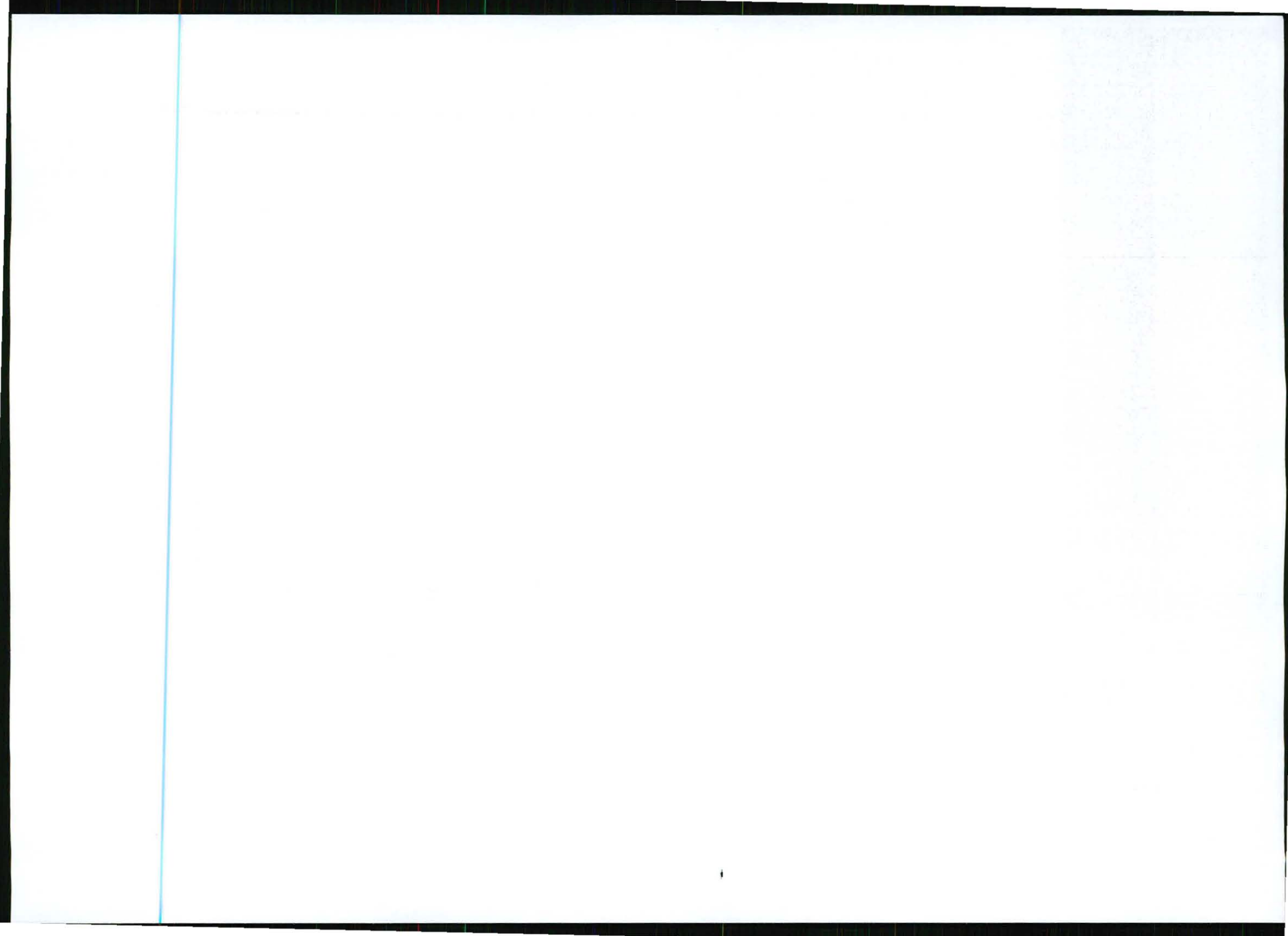
Source: Constructed by the Author (Original available)



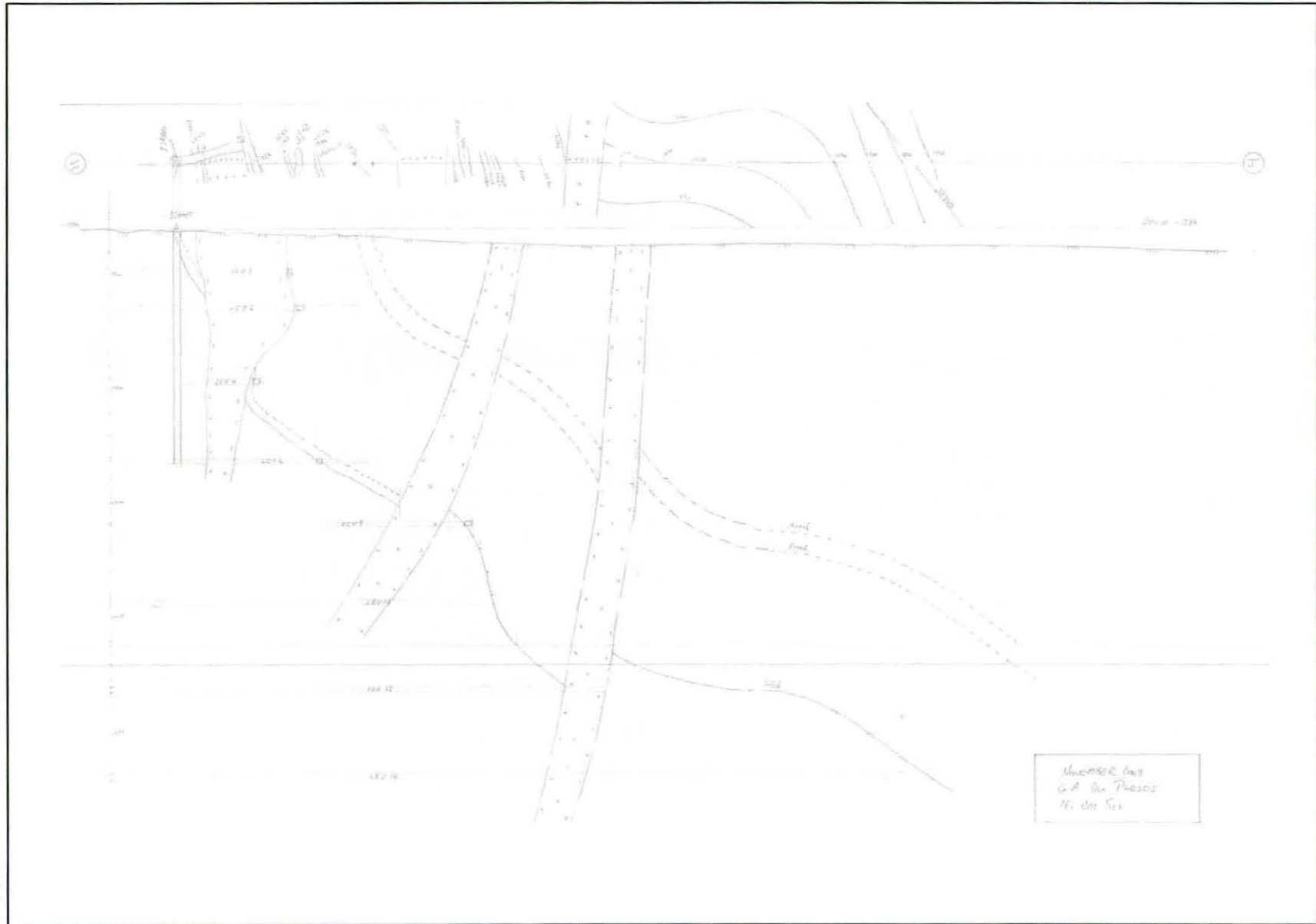
Appendix 5 - Cross-section along line GH (Figure 16)



Source: Constructed by the Author (Original available)

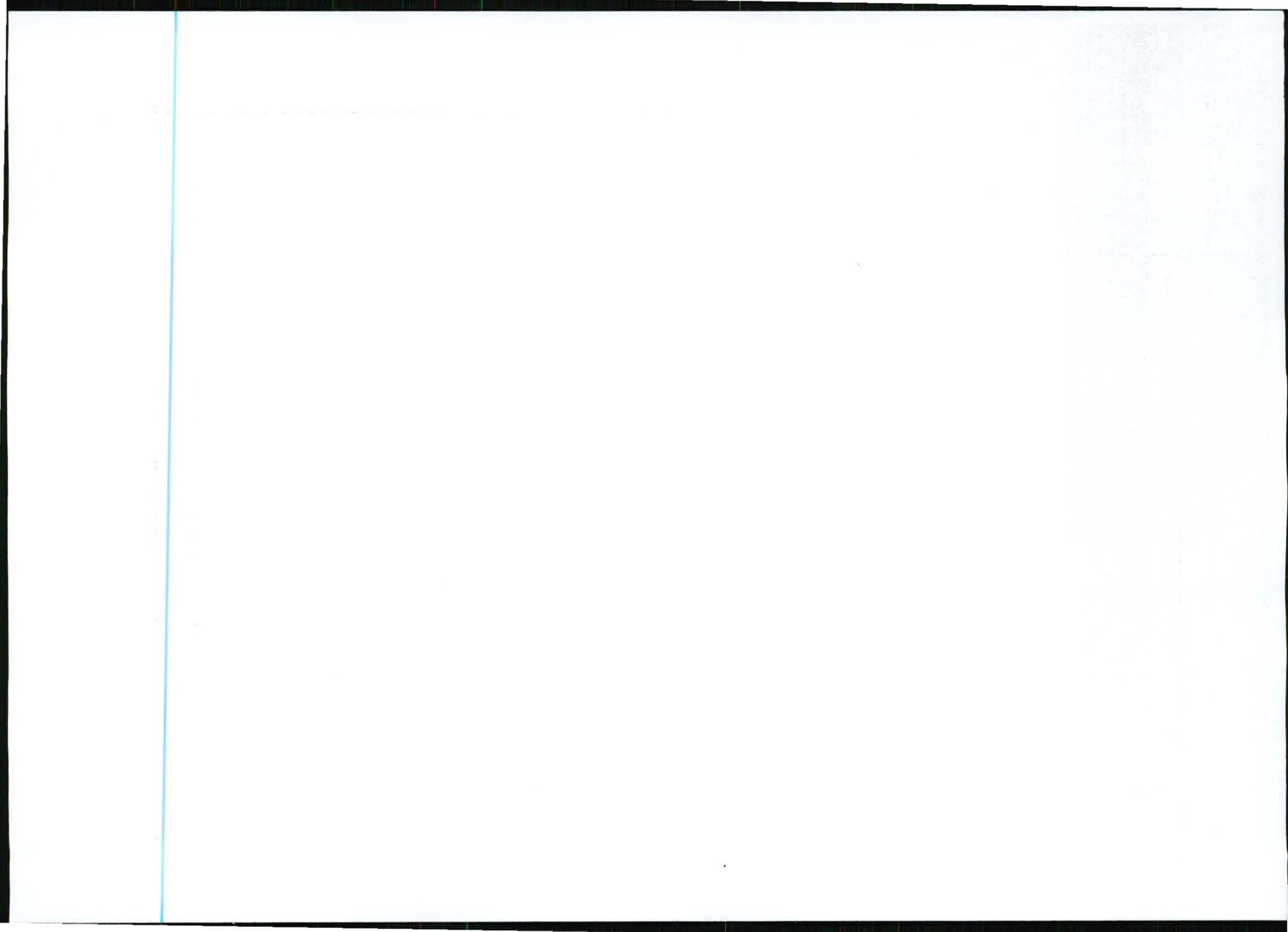


Appendix 6 - Cross-section along line IJ (Figure 16)

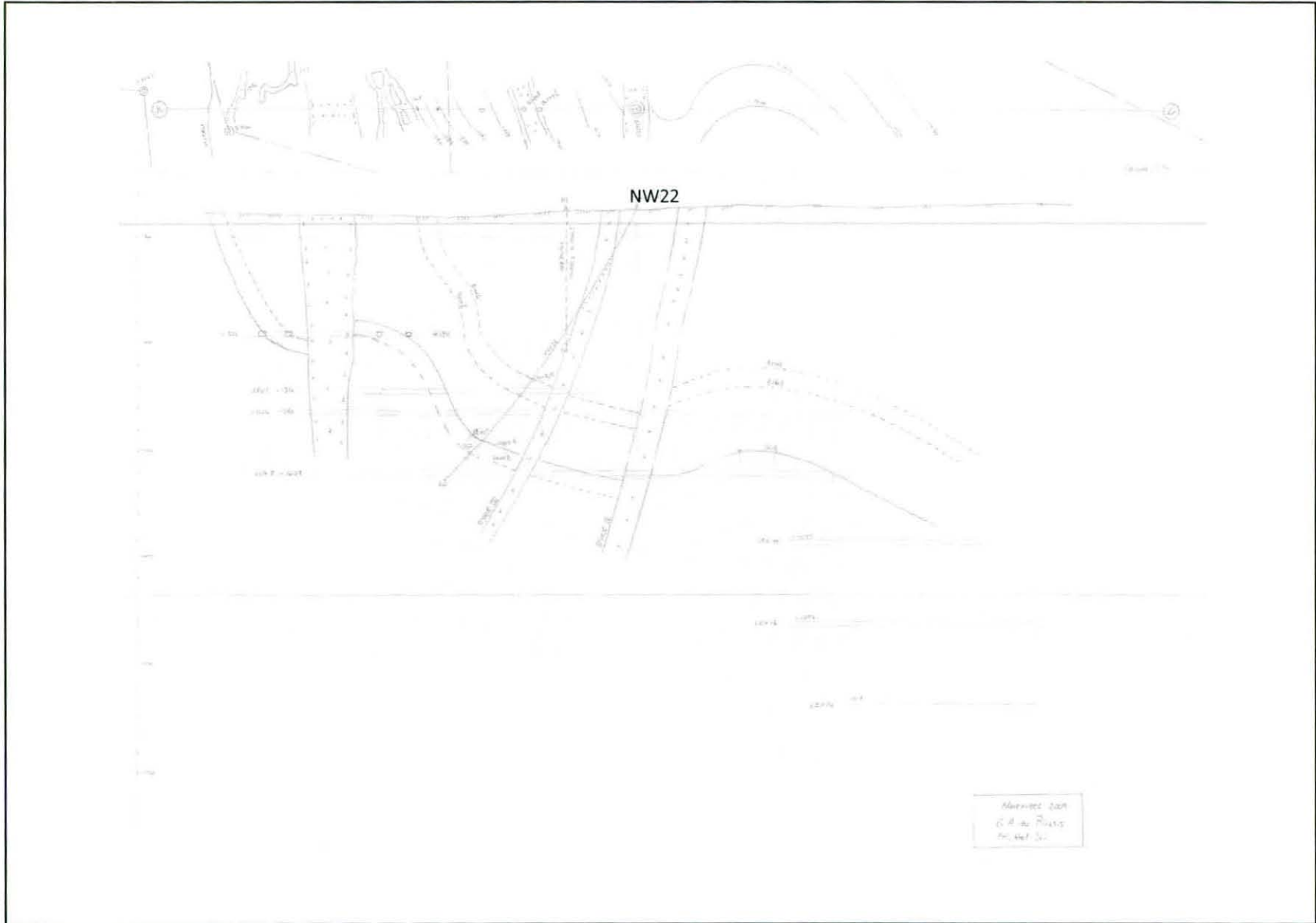


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Source: Constructed by the Author (Original available)

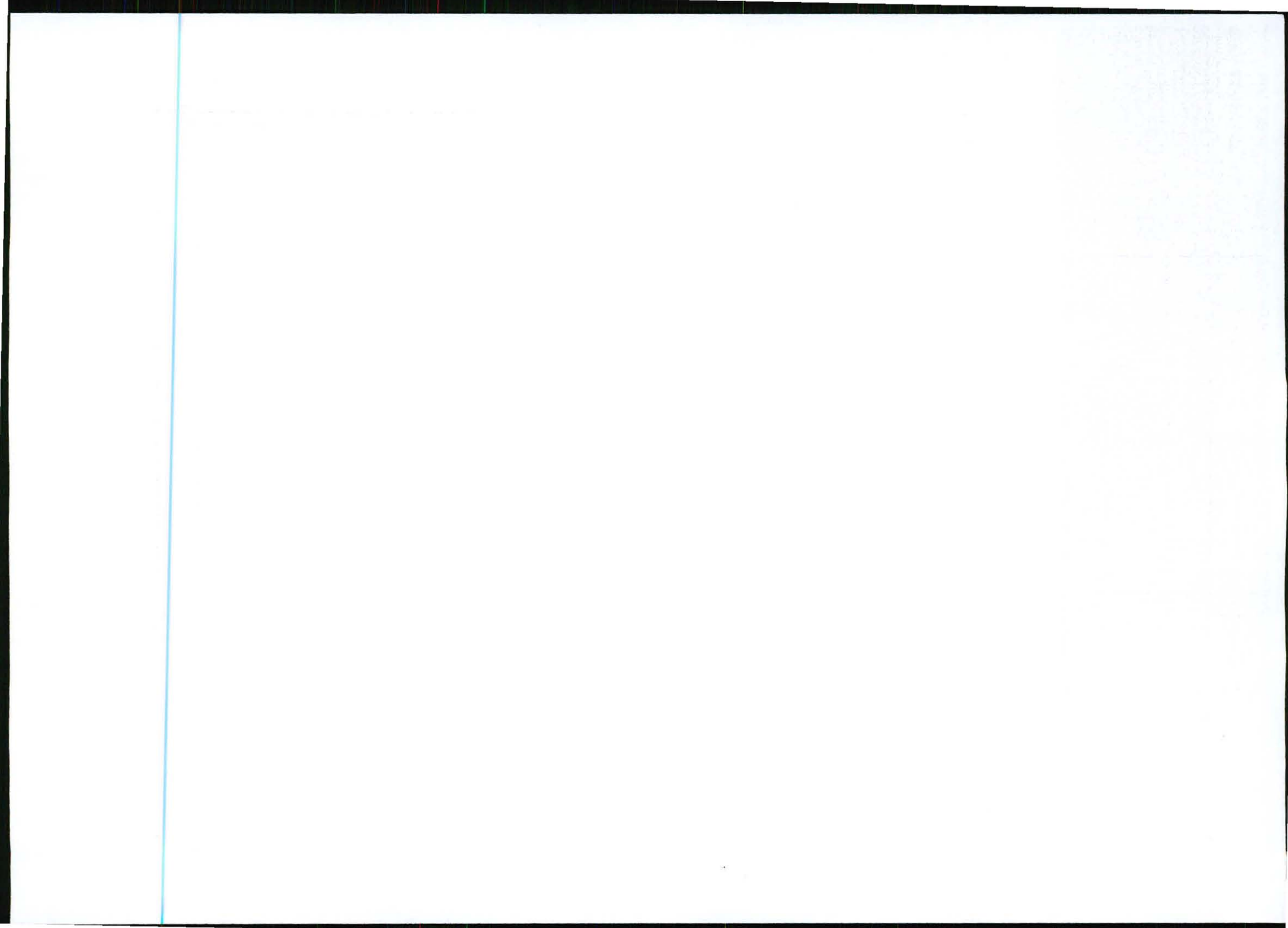


Appendix 7 - Cross-section along line KL (Figure 16)



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Source: Constructed by the Author (Original available)

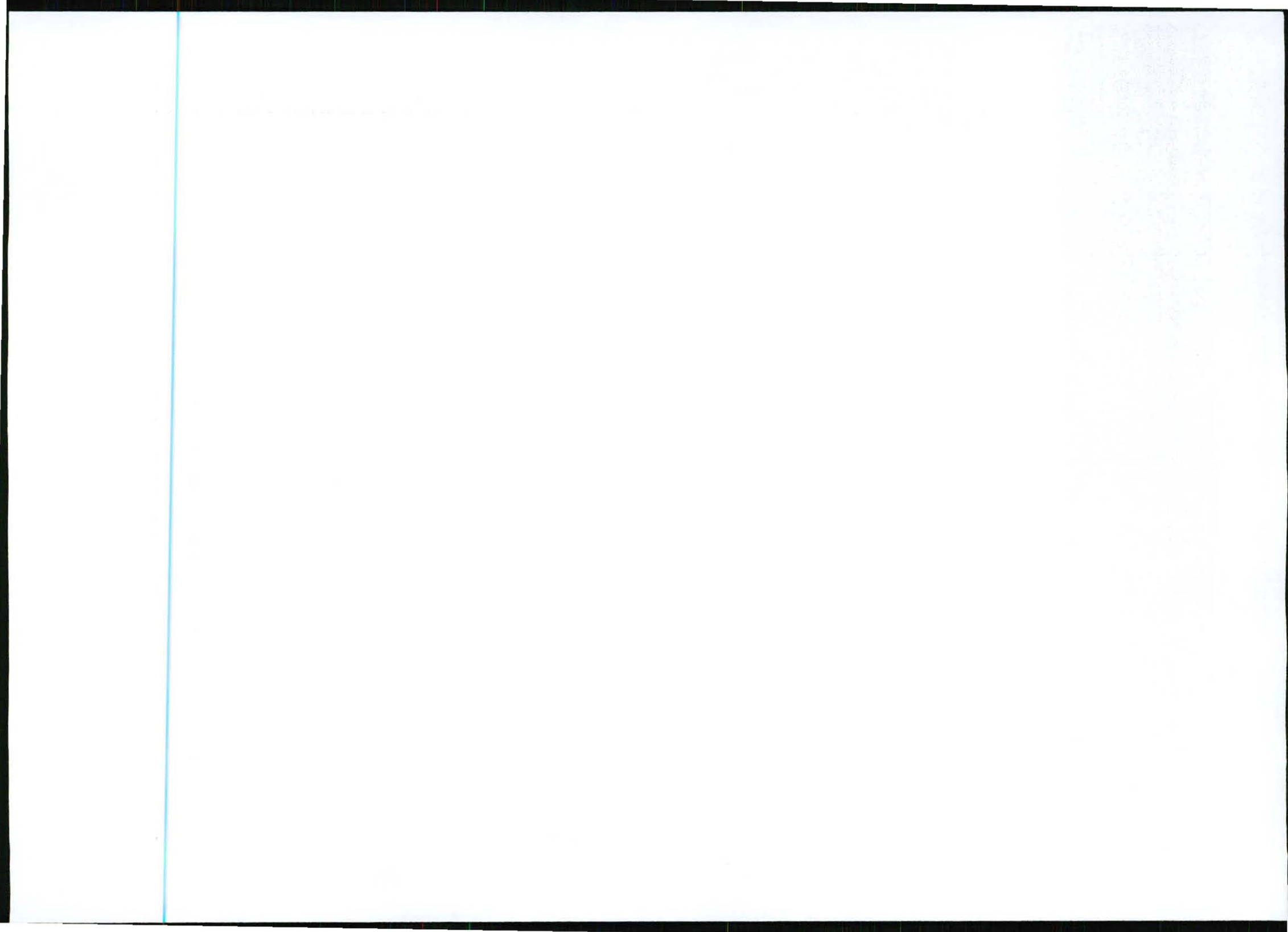


Appendix 8 - Cross-section along line MN (Figure 16)

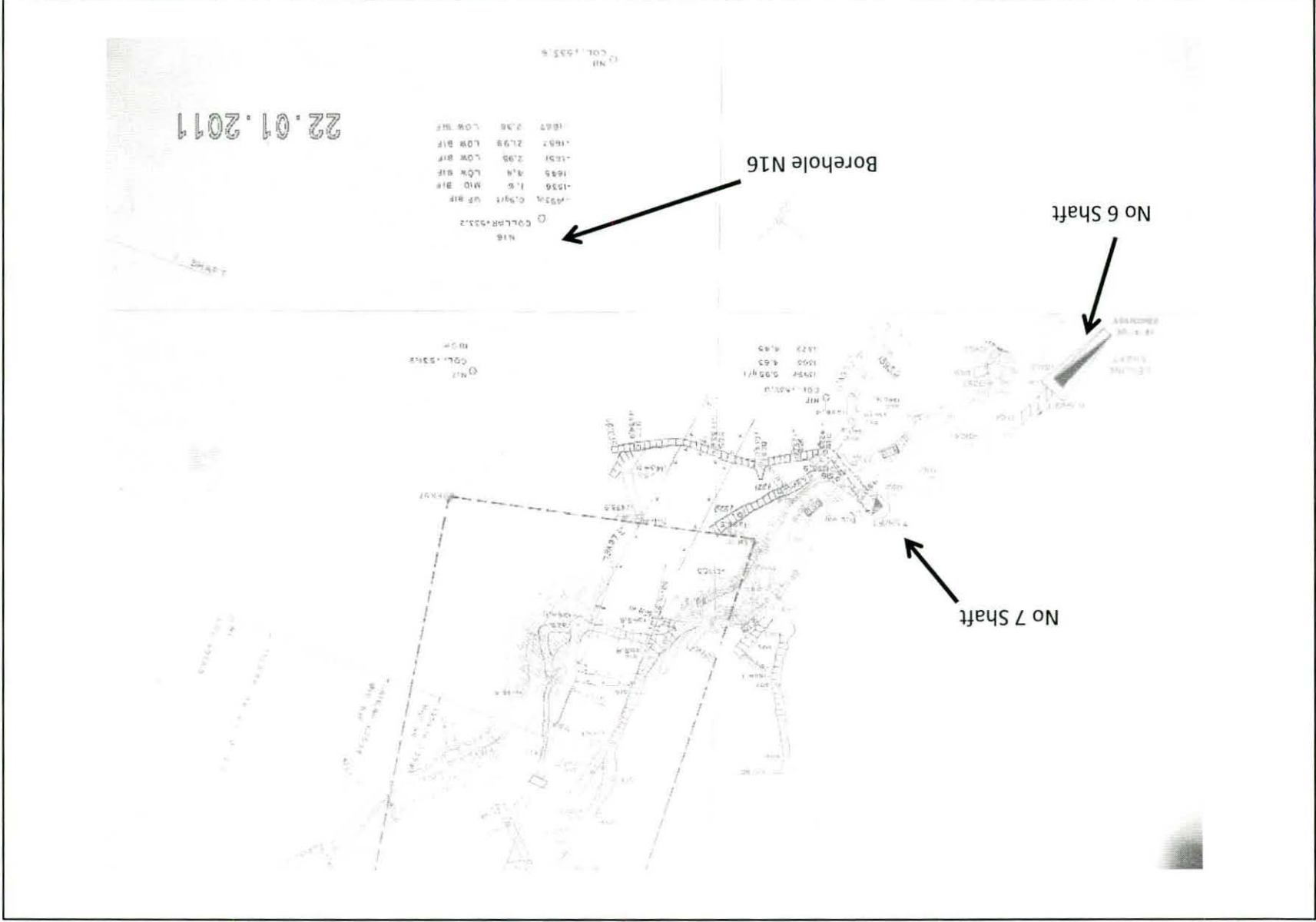


G.A. du Plessis
January 2011

Source: Constructed by the Author (Original available)

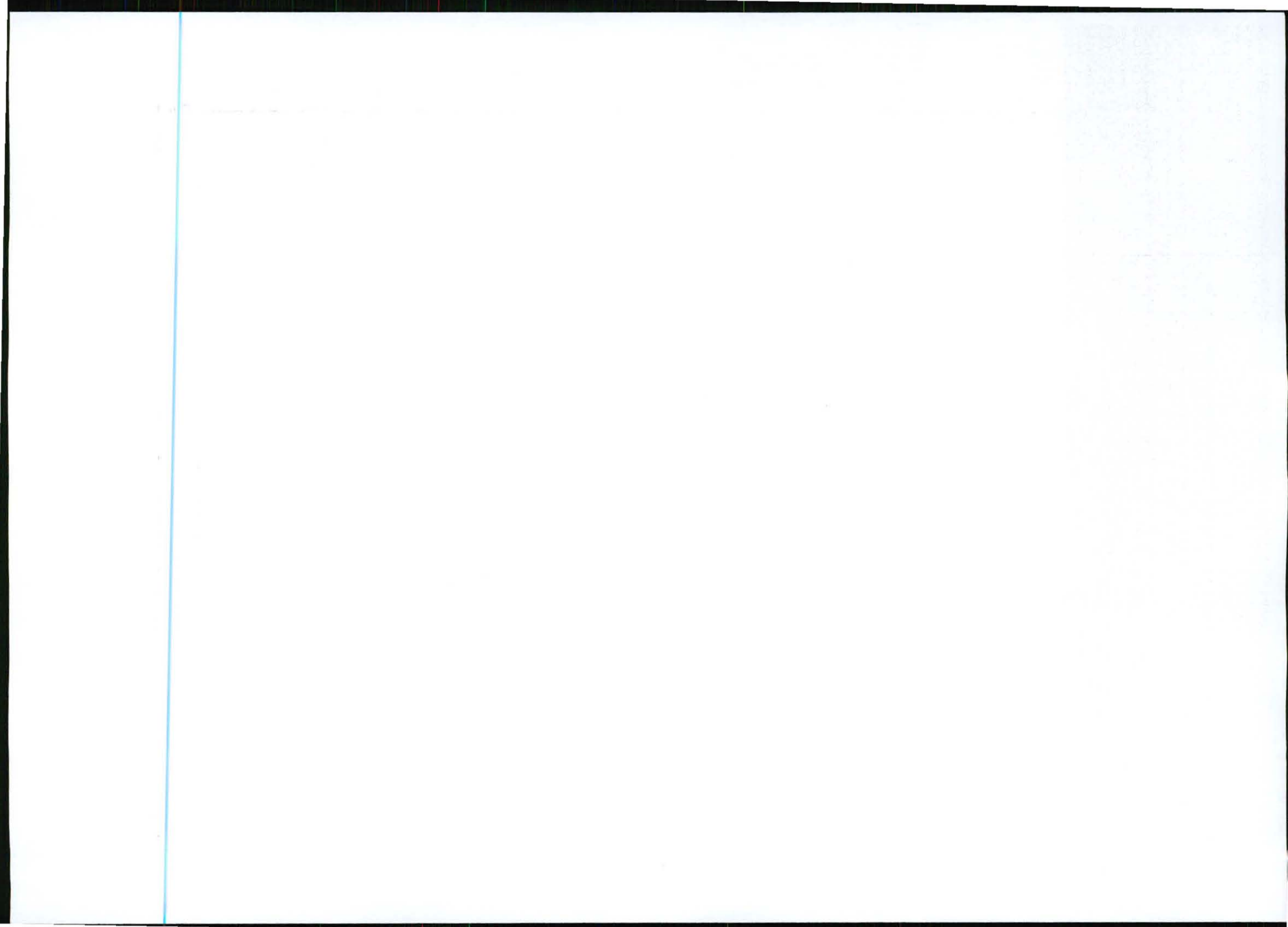


Appendix 9 - The Eastern Shear Zone BIF historical production No 7 Shaft



Source: The Author and HectoCorp

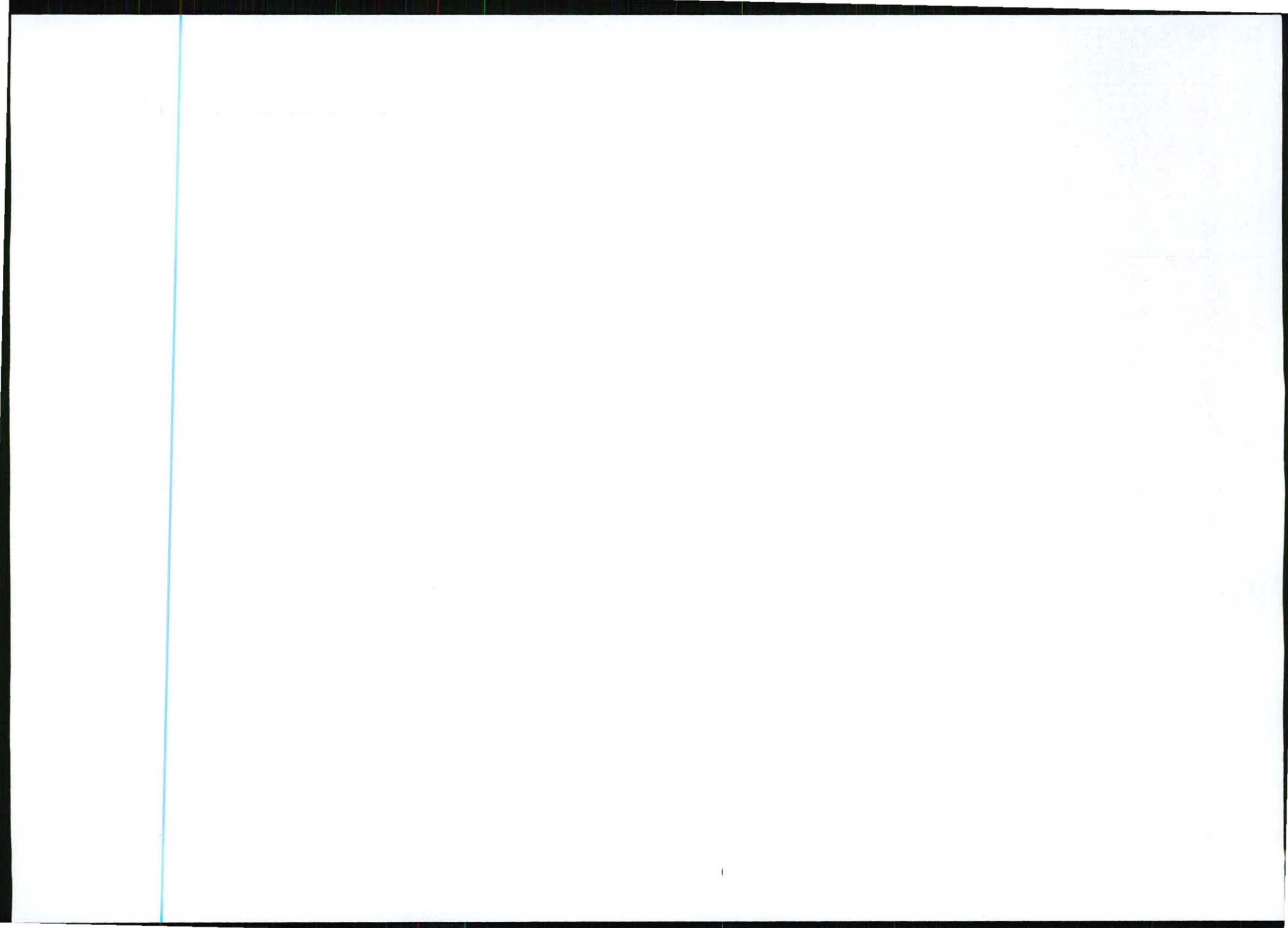
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Appendix 10 - The Eastern Shear Zone BIF historical production - Central



Source: The Author and HectoCorp



Appendix 11 - The Eastern Shear Zone BIF historical production No 8 Shaft

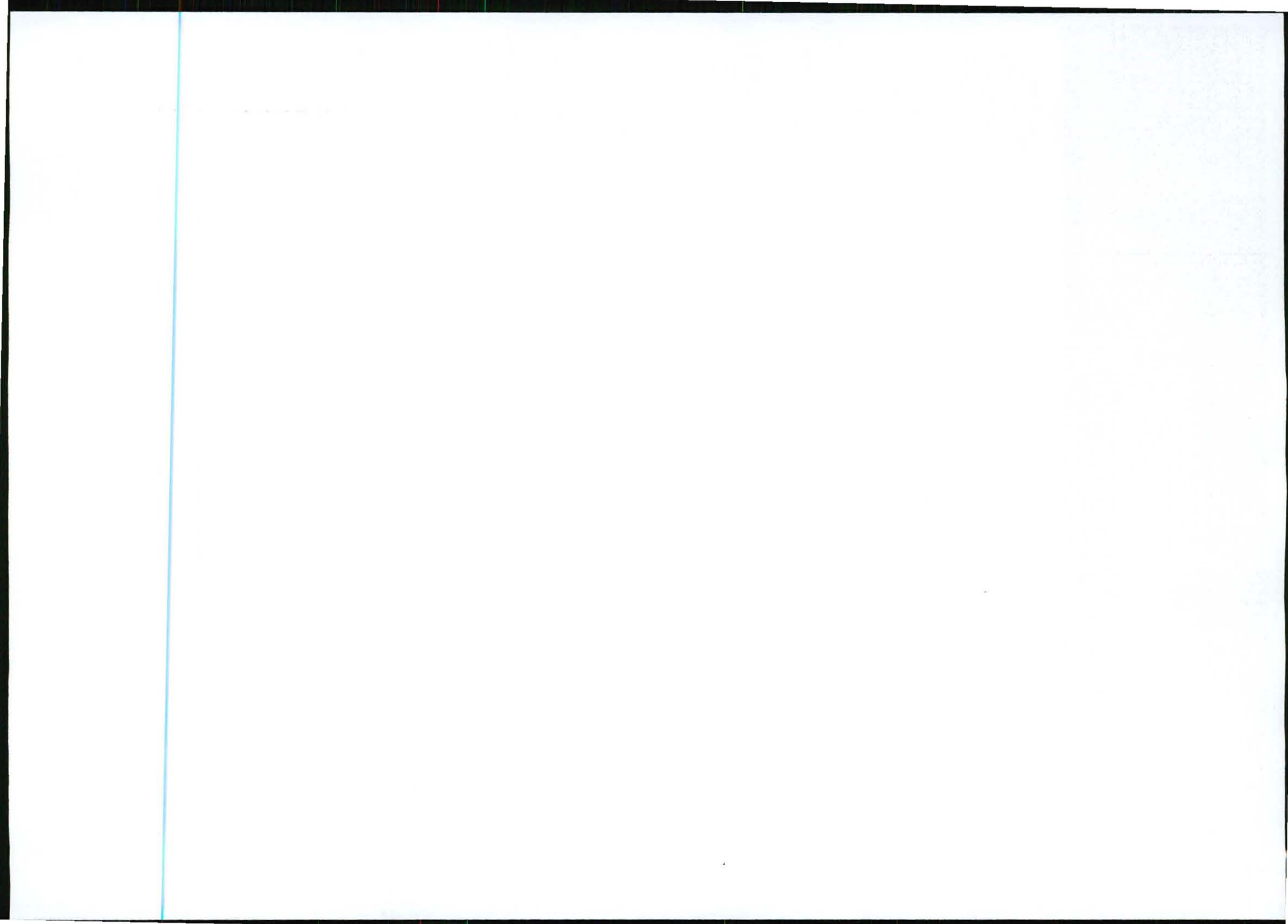


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COL. 523.2
-1448.1m 3043.1

Source: The Author and HectoCorp

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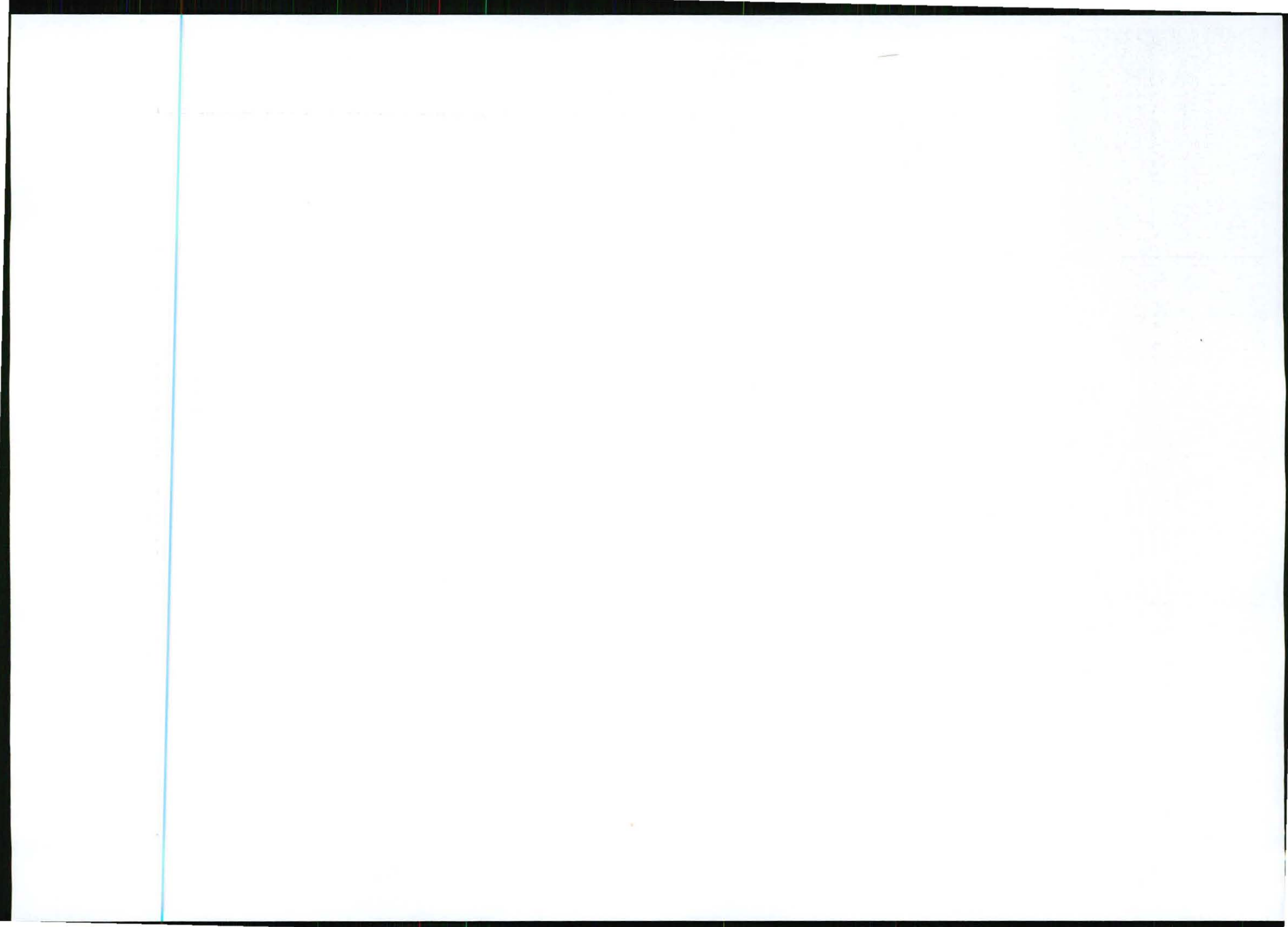


Appendix 12 - The Eastern Shear Zone BIF Section Profile No 7 Shaft

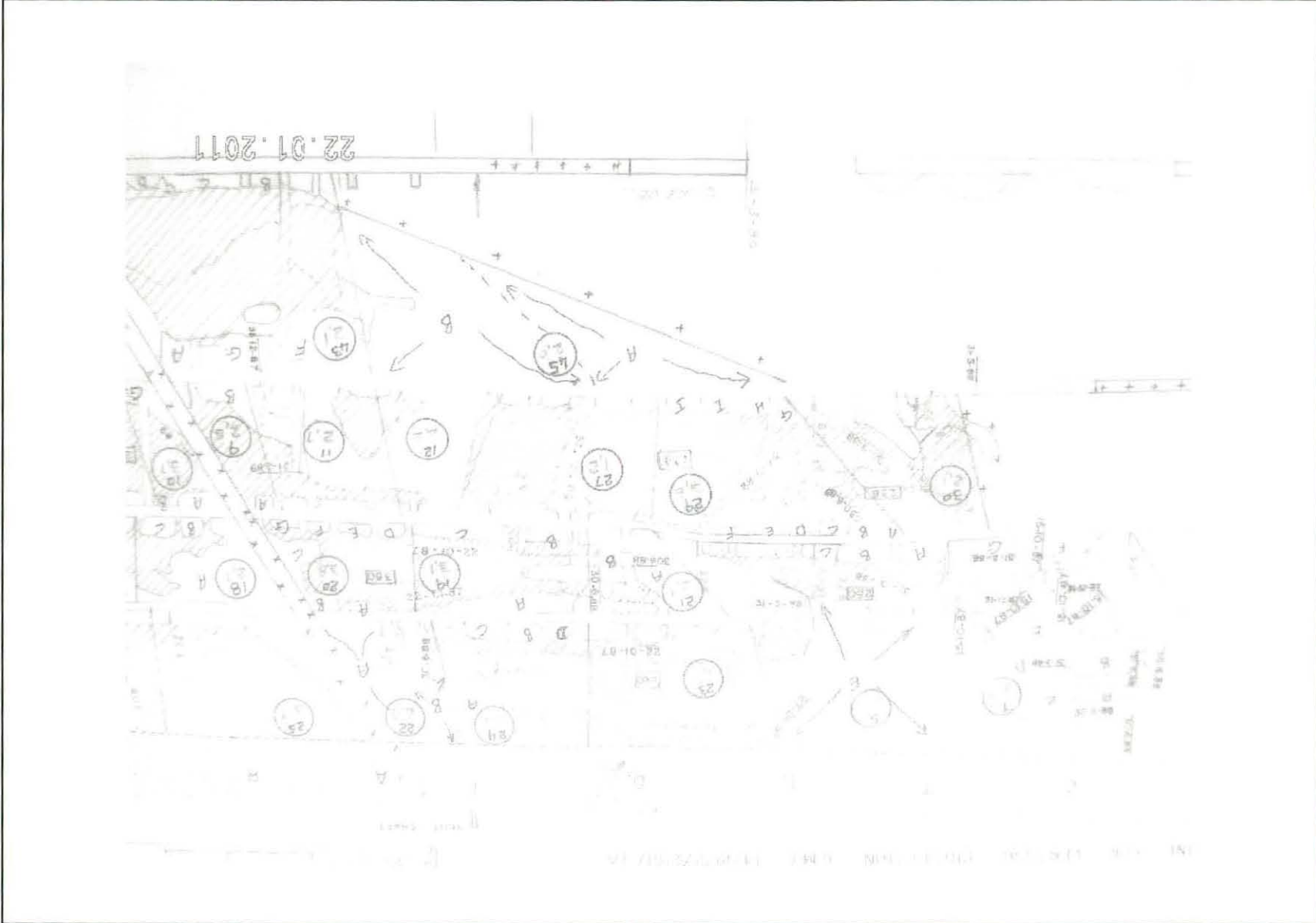


Source: The Author and HectoCorp

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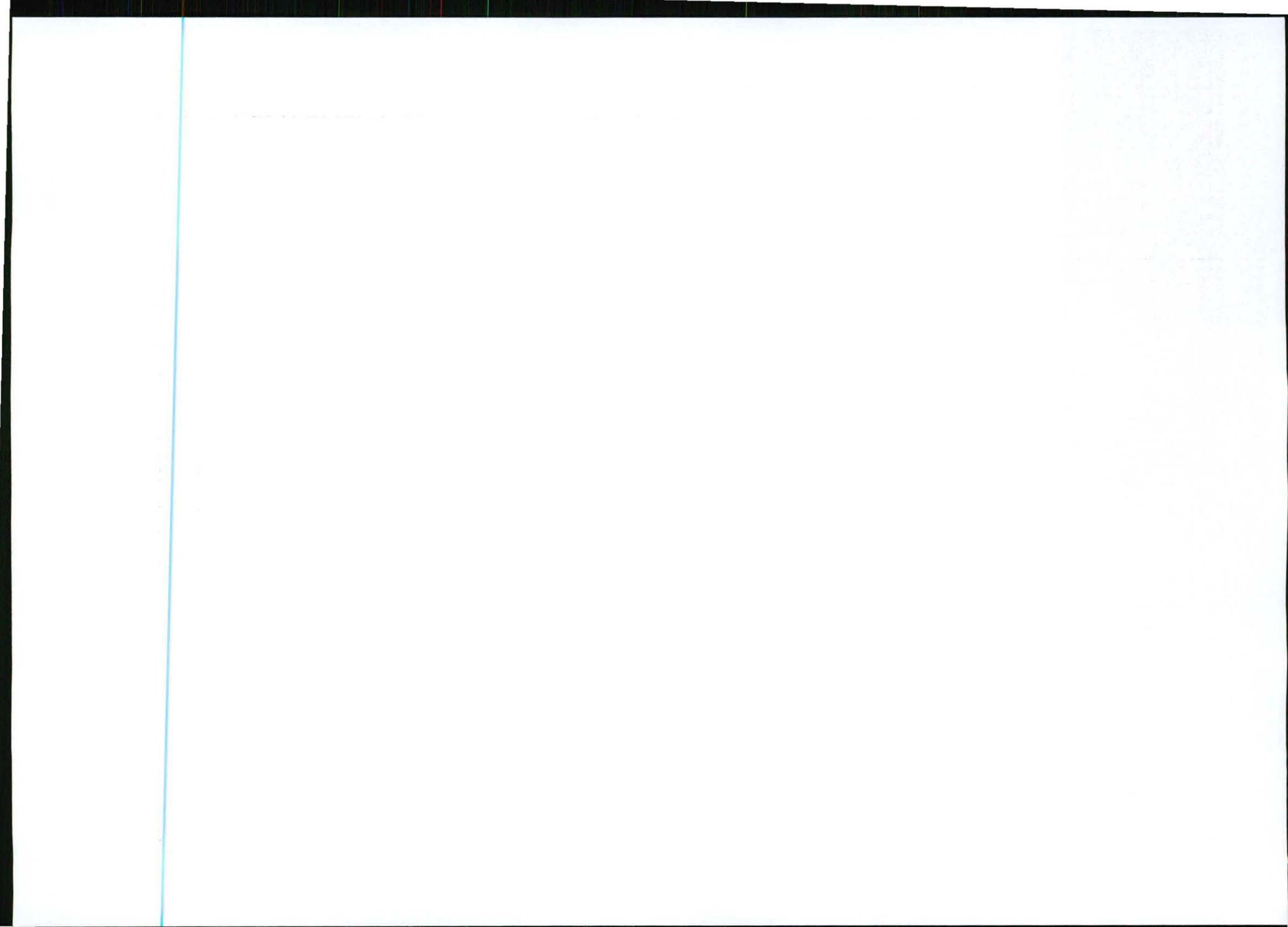


Appendix 13 - The Eastern Shear Zone BIF Section Profile - Central

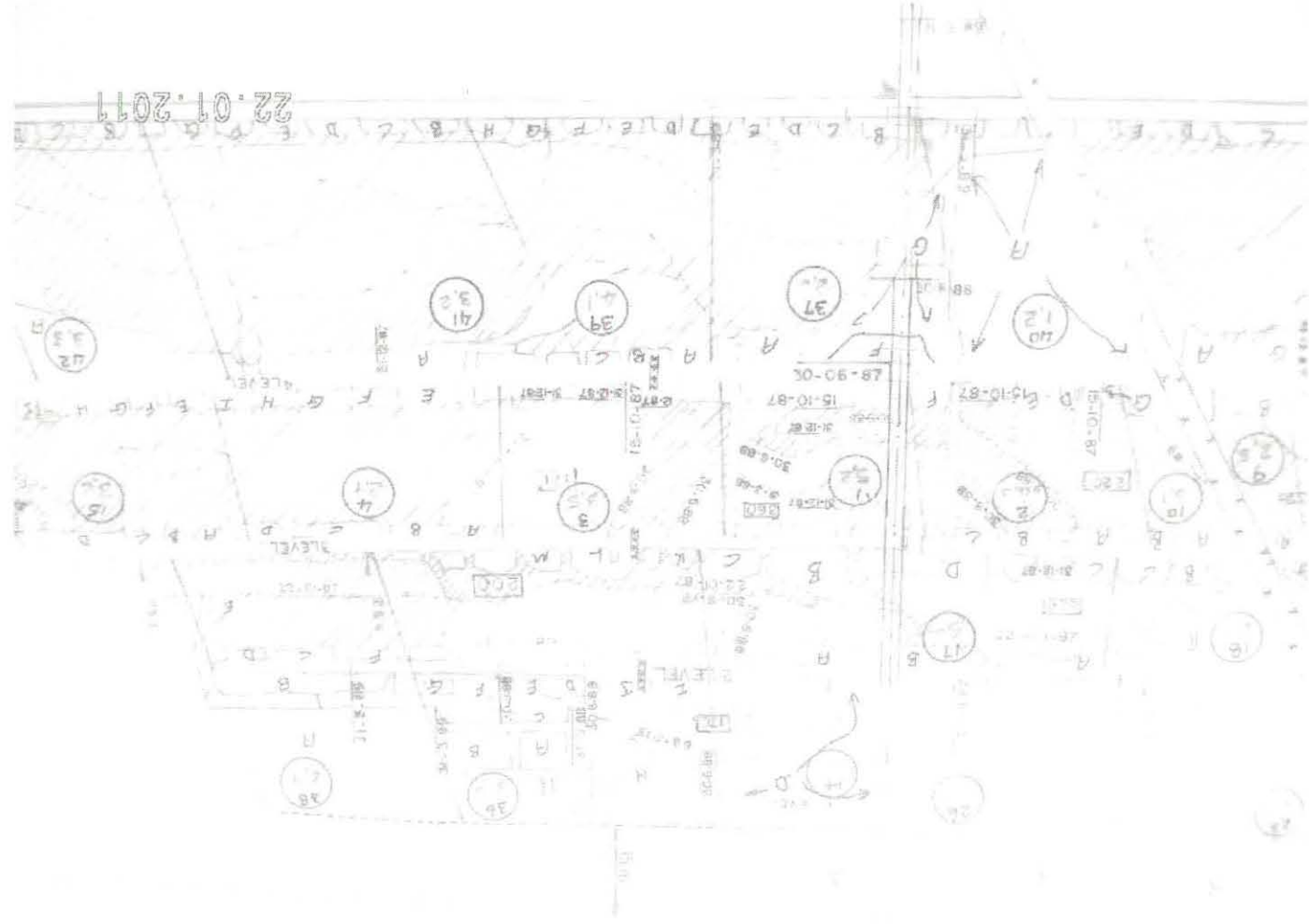


Source: The Author and Hectocorp

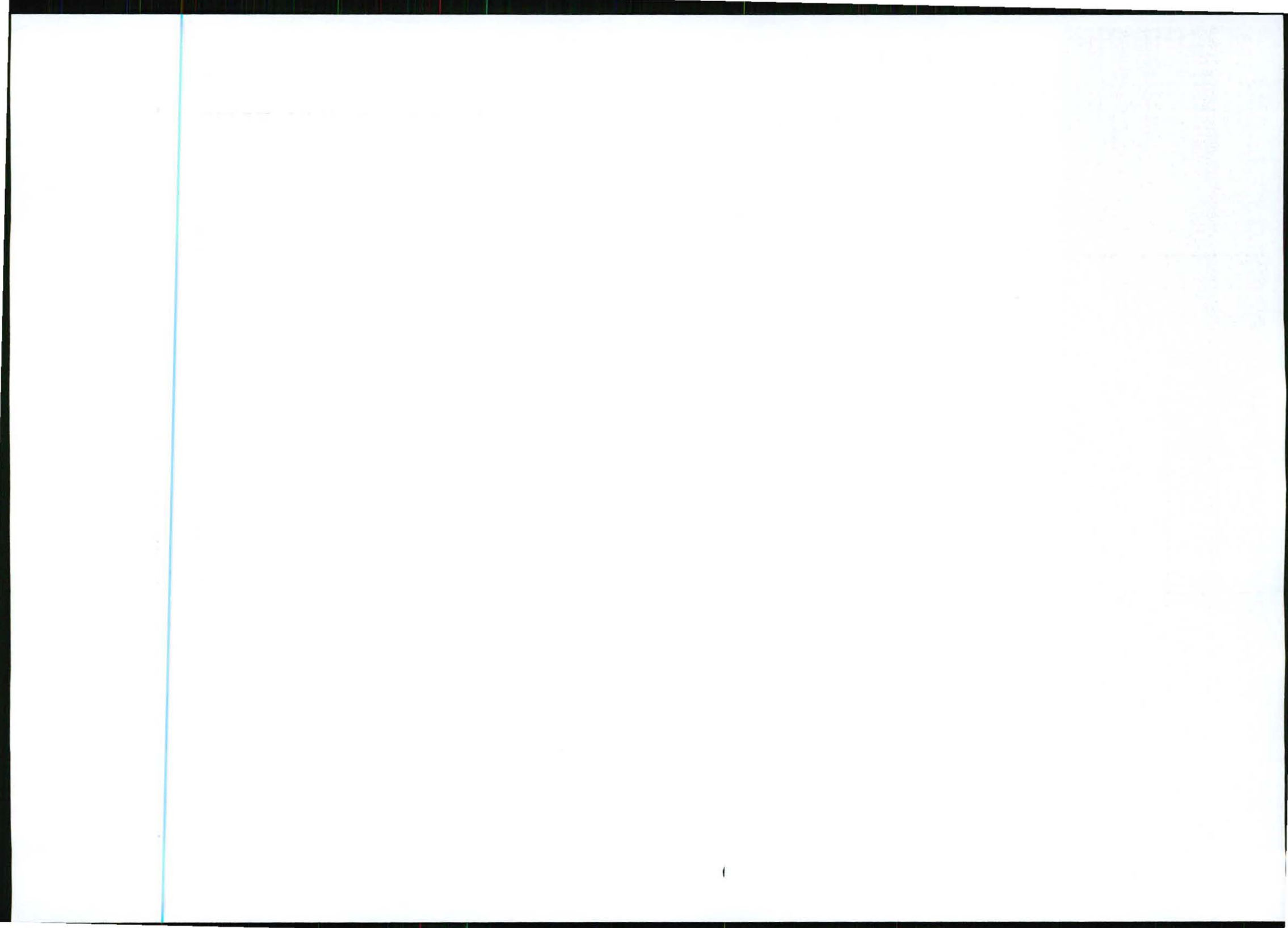
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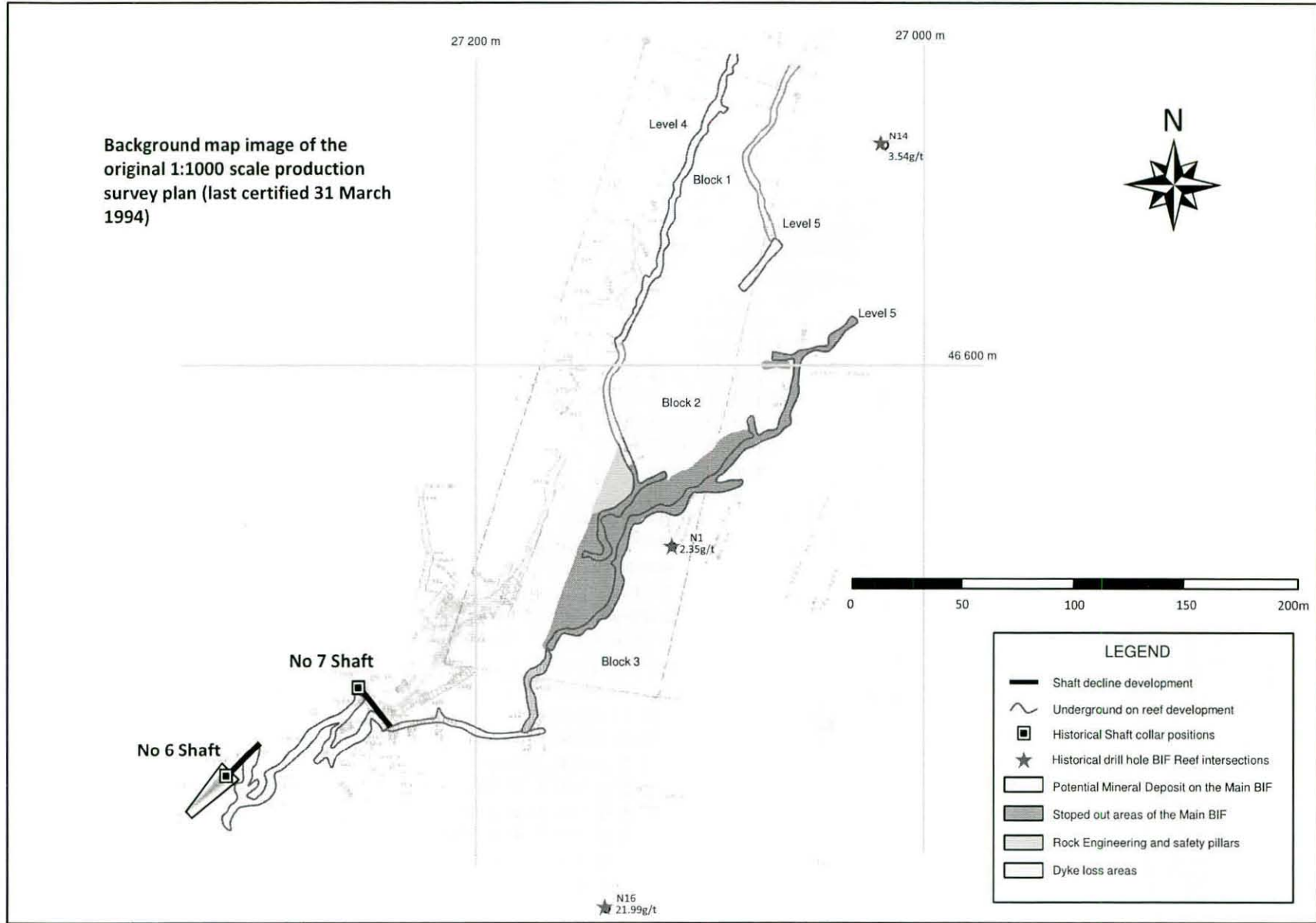
Appendix 14 - The Eastern Shear Zone BIF Section Profile - No 8 Shaft



Source: The Author and Hectocorp

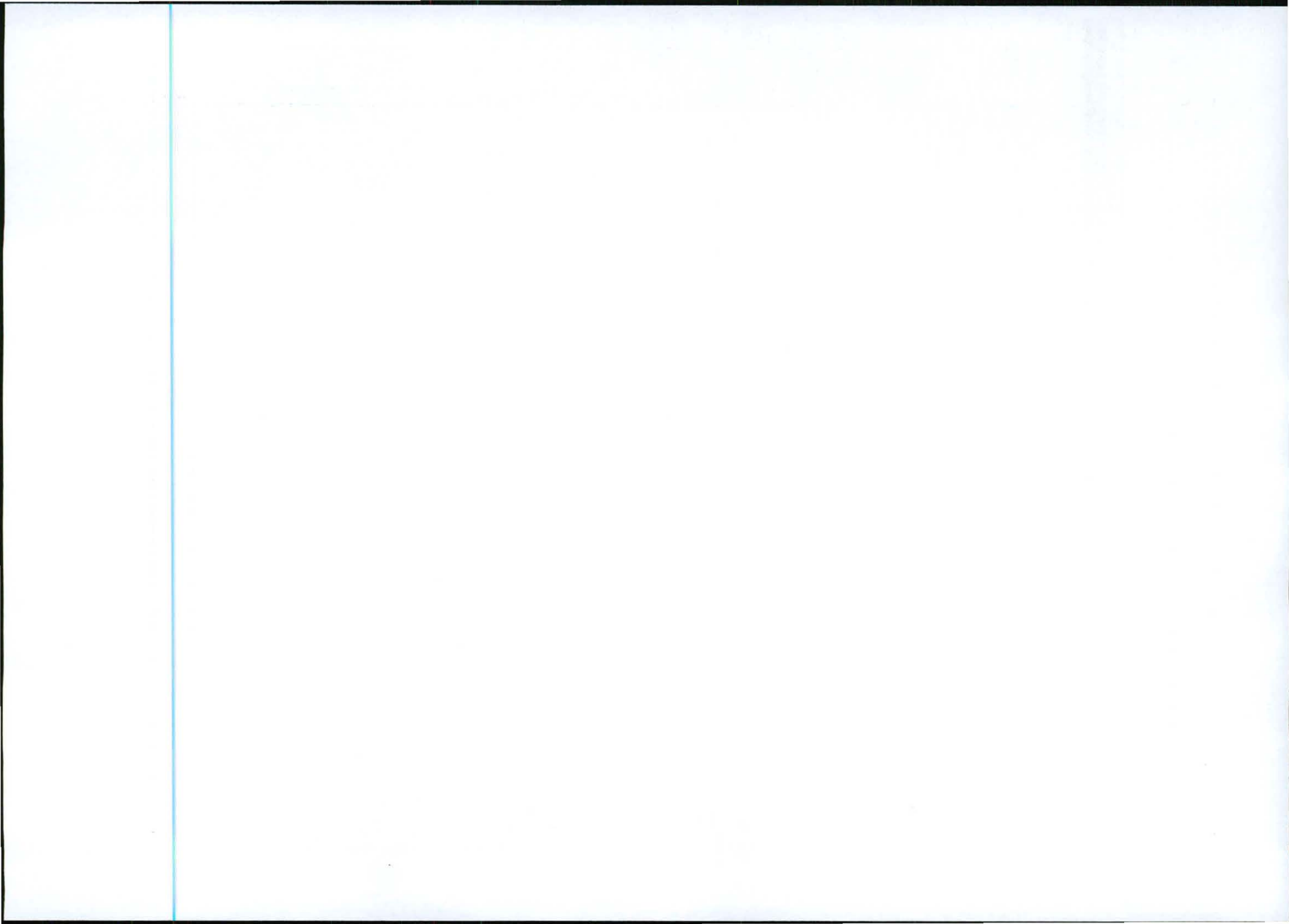


Appendix 15 - The Potential Mineral Deposit of the Eastern Shear Zone BIFs

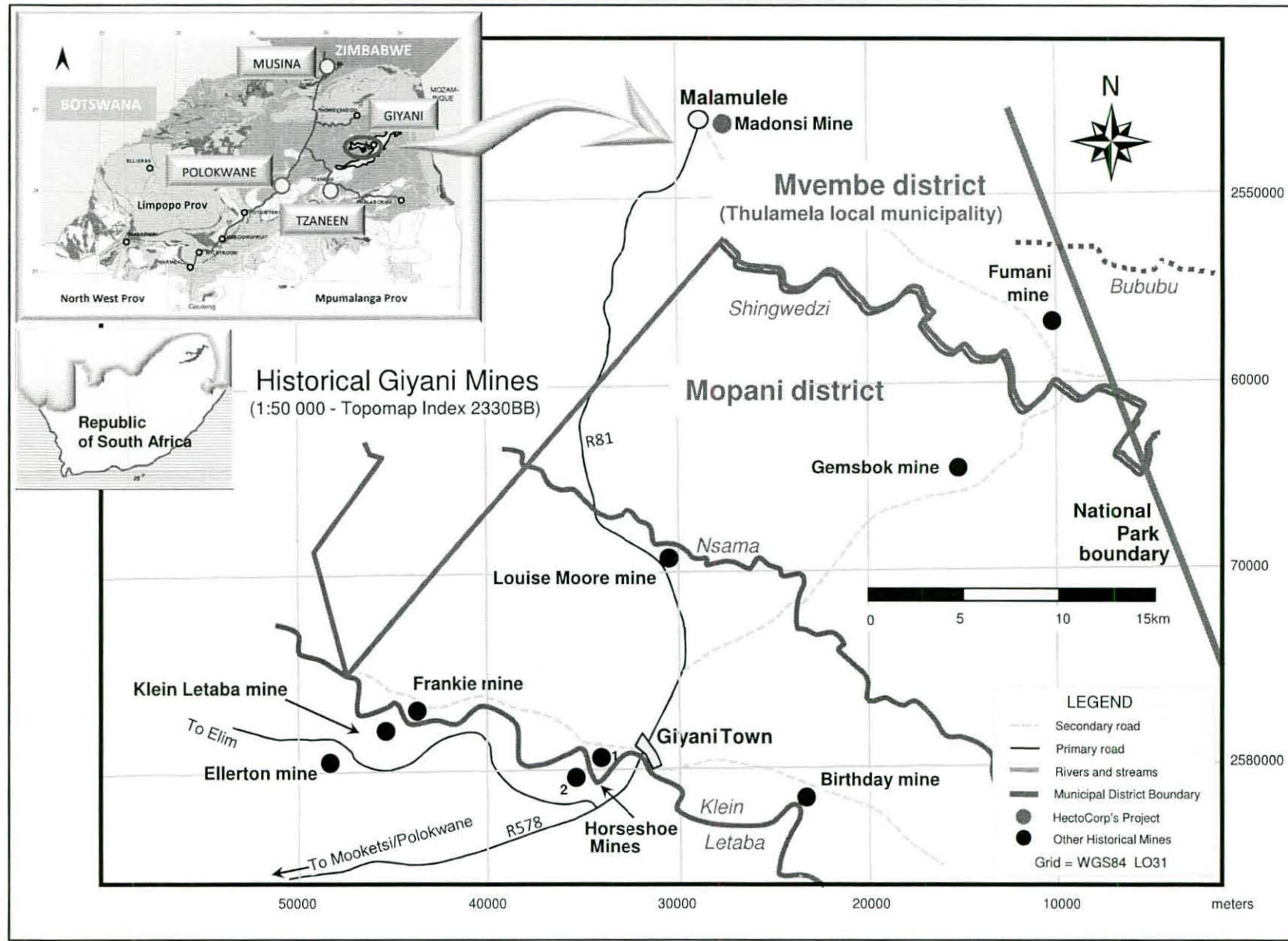


G.A. du Plessis
January 2011

Source: The Author and HectoCorp



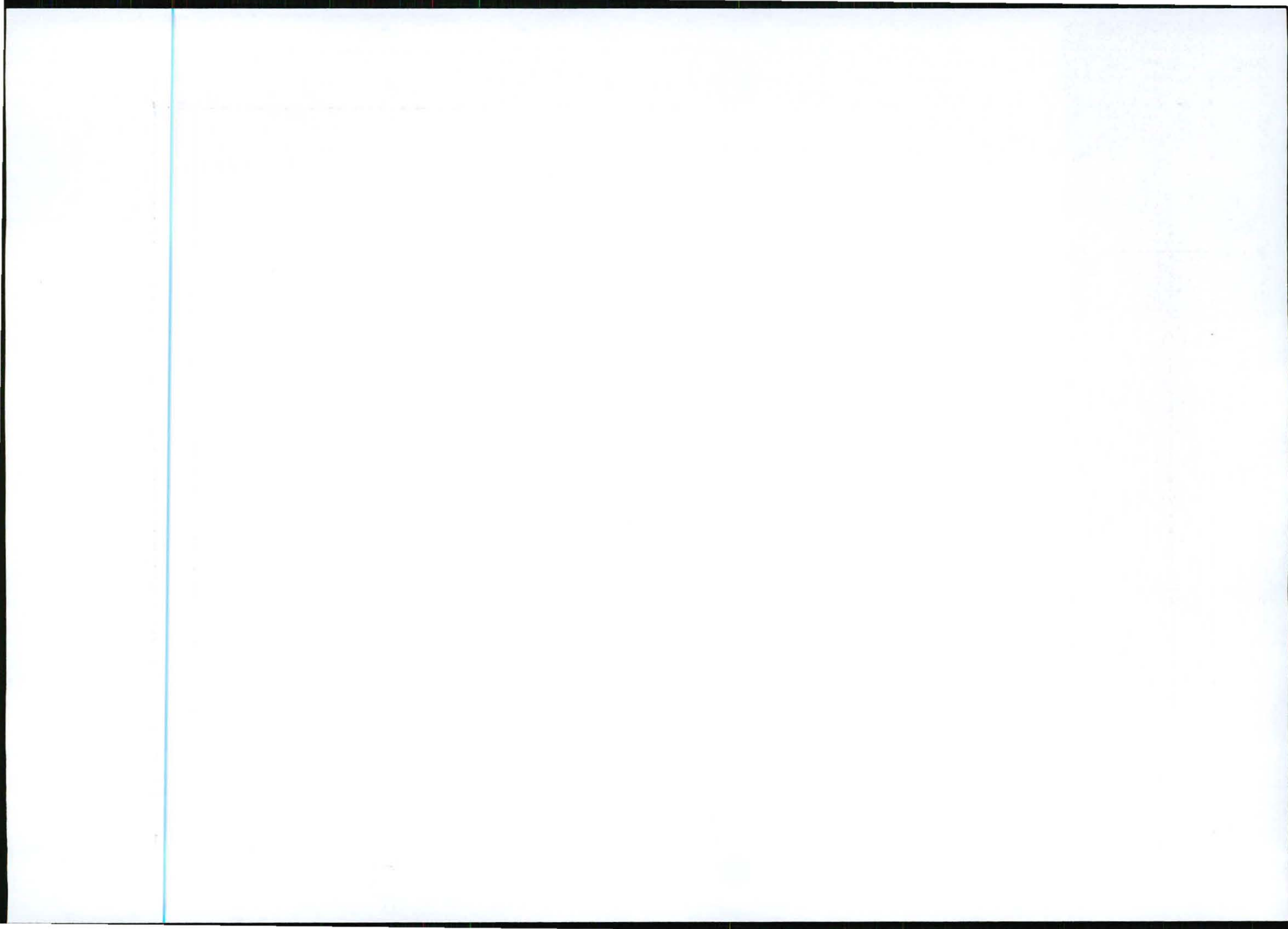
LOCATION OF HECTOCORP'S GOLD ASSET



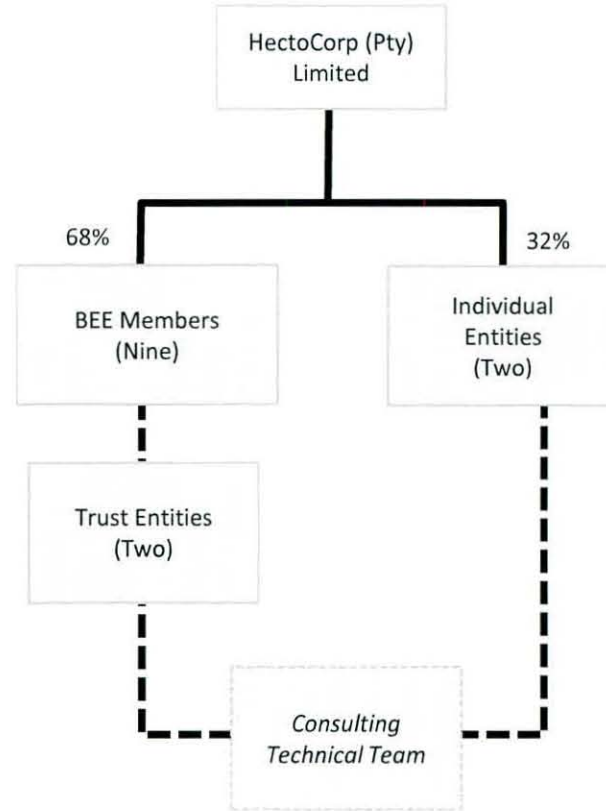
G.A. du Plessis
January 2011

Source: The Author

Figure 01

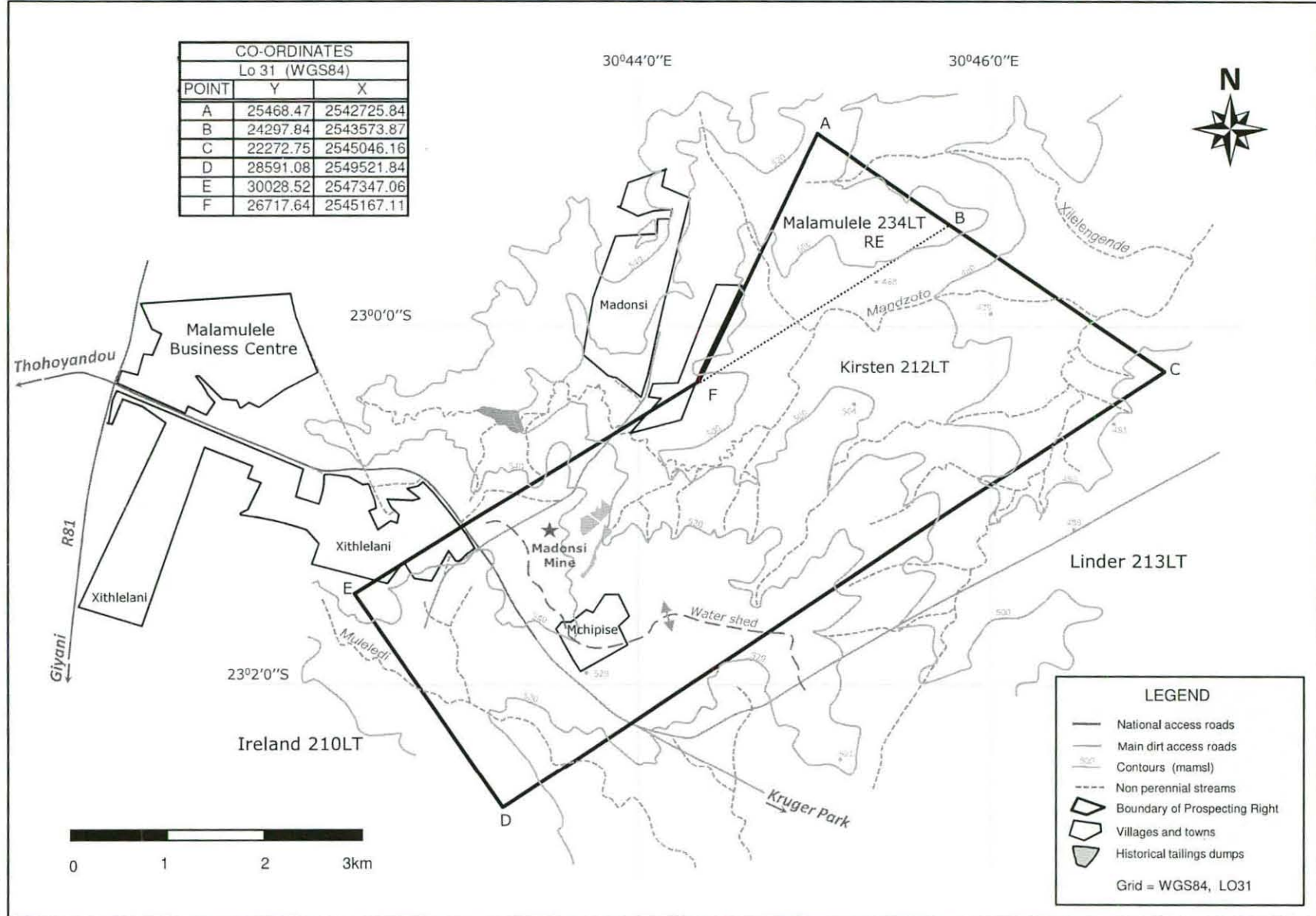


HECTOCORP'S CORPORATE STRUCTURE





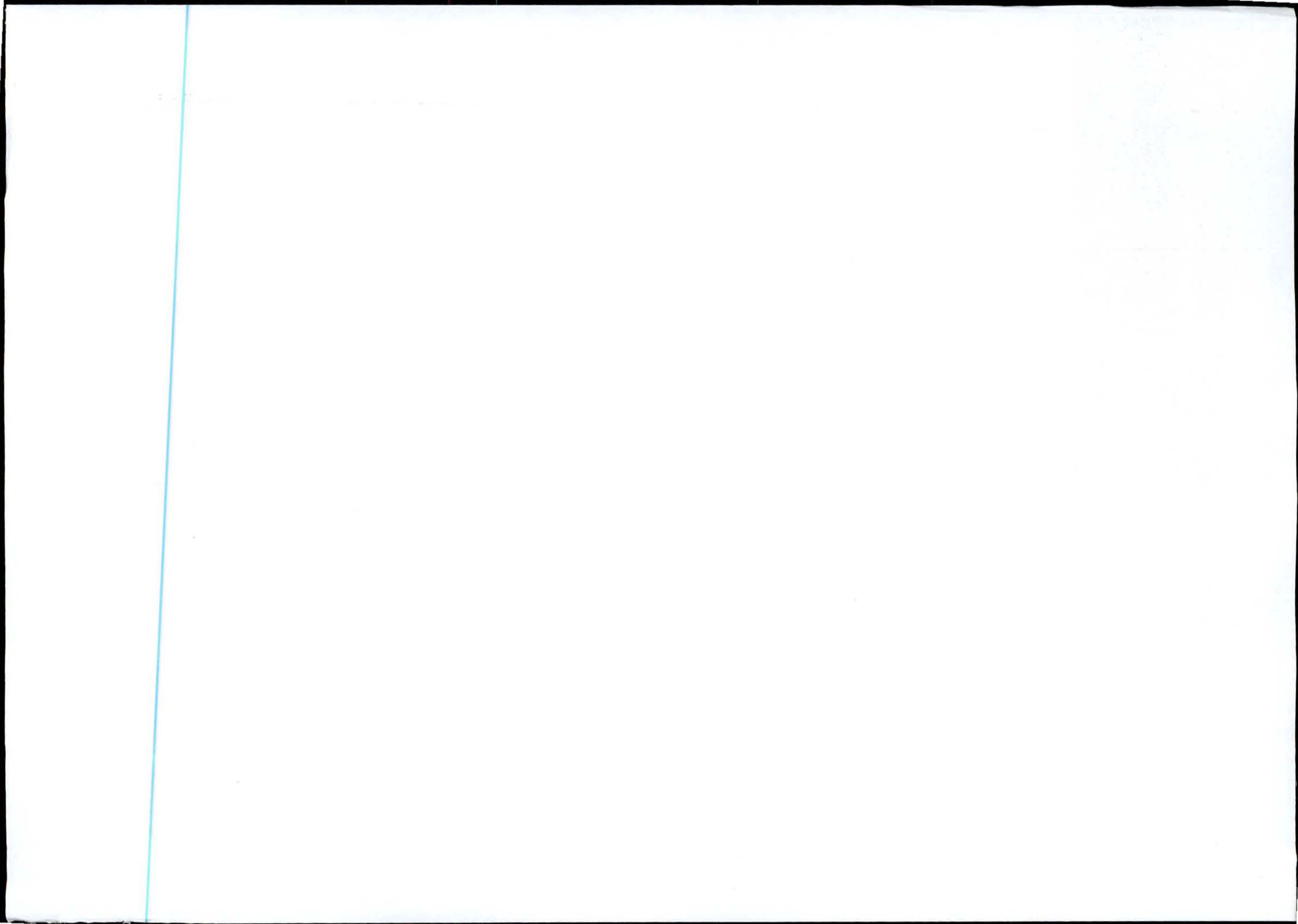
THE MADONSI PROJECT ADJACENT THE TOWN OF MALAMULELE



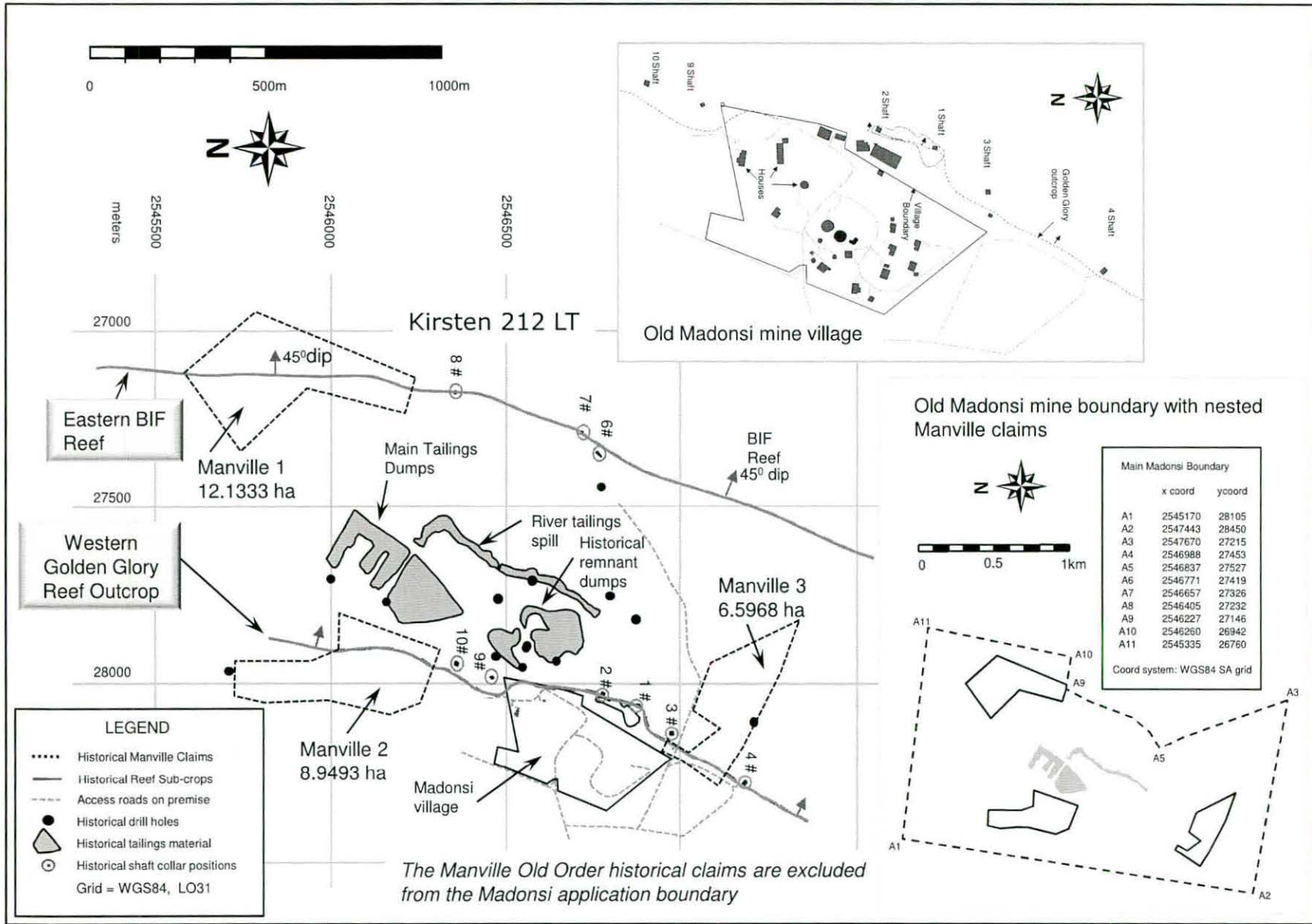
G.A. du Plessis
January 2011

Source: The Author

Figure 03



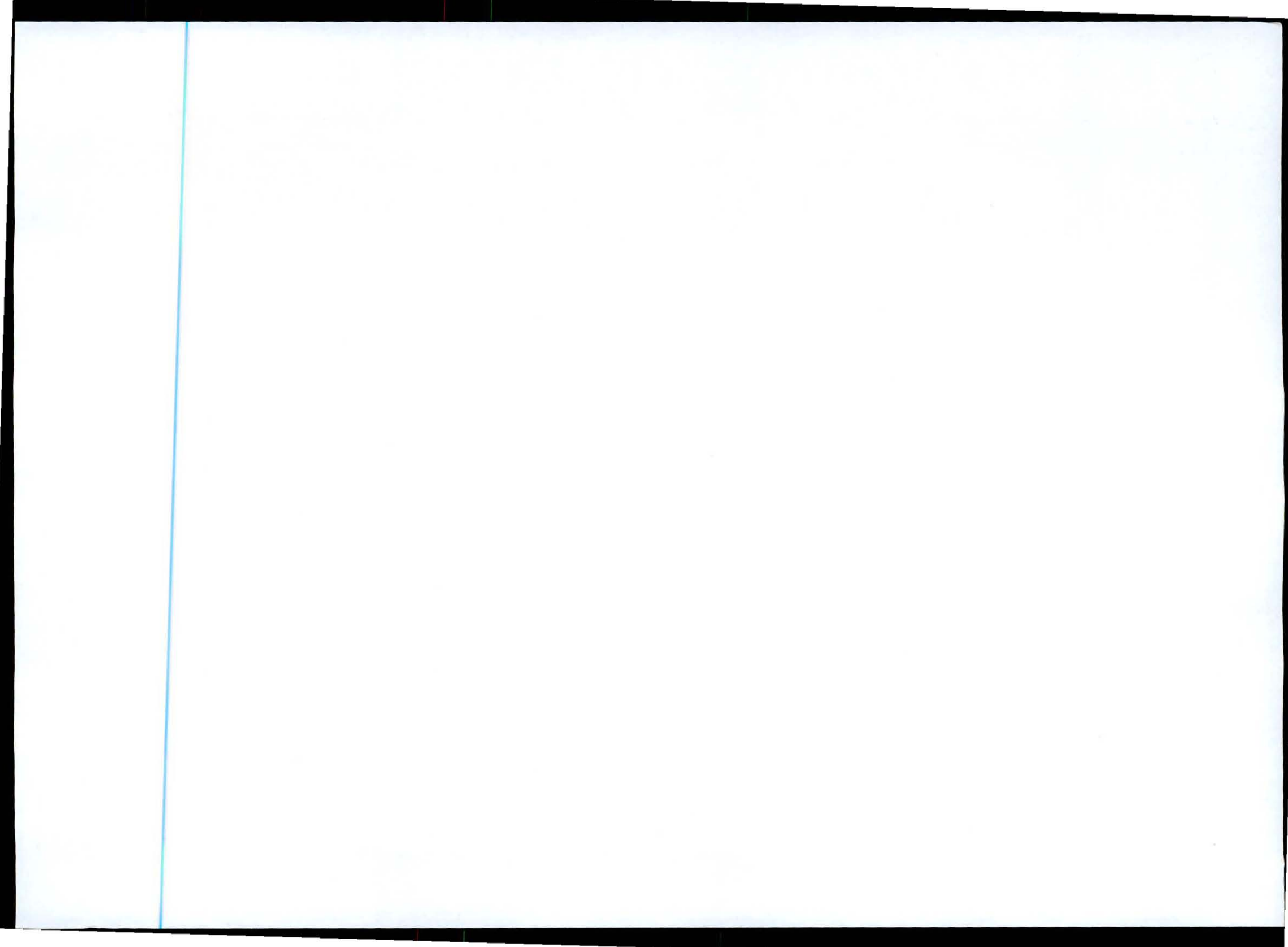
HISTORICAL SHAFT POSITIONS AT THE OLD MADONSI MINE



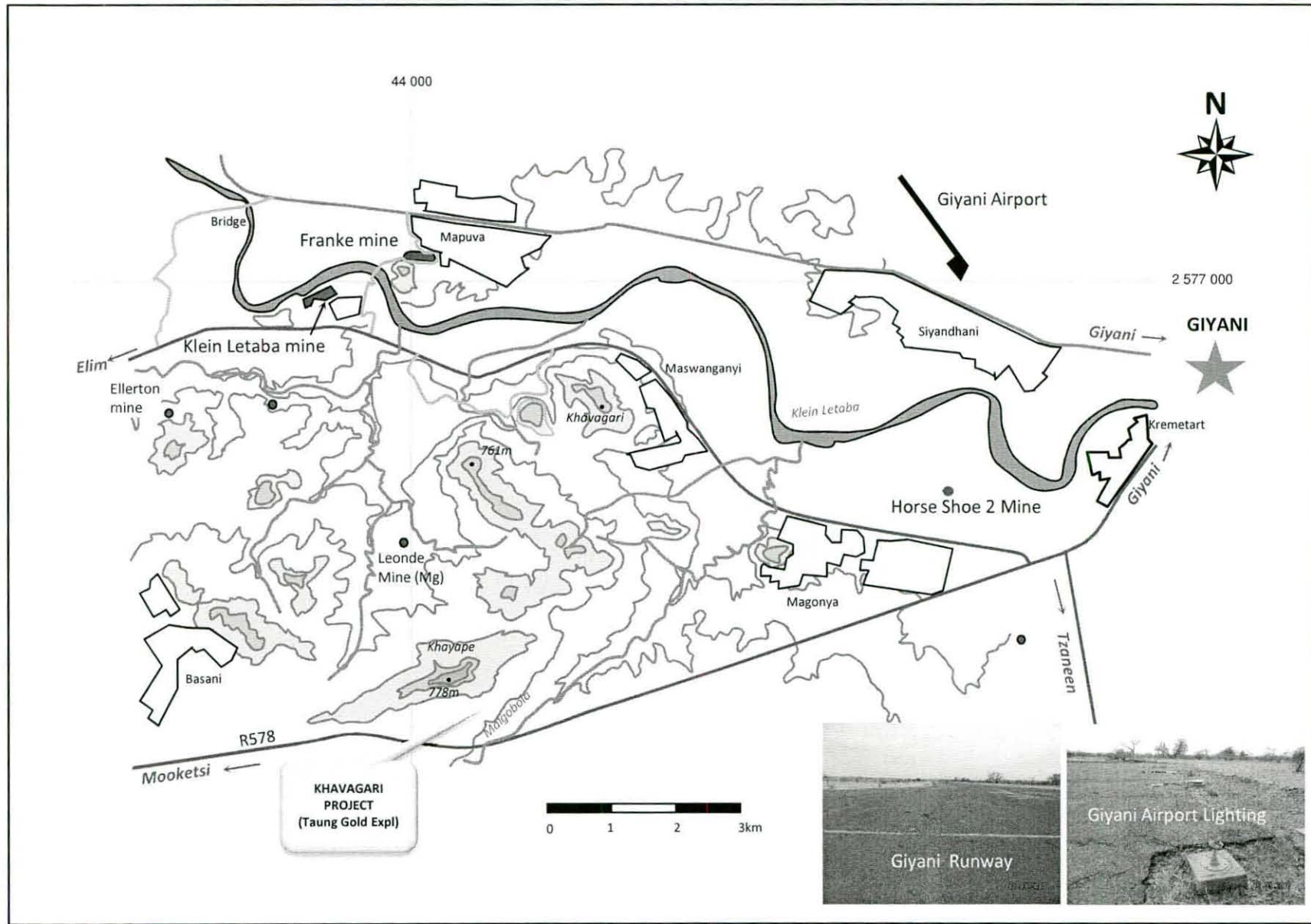
G.A. du Plessis
January 2011

Source: The Author and HectoCorp for info

Figure 04



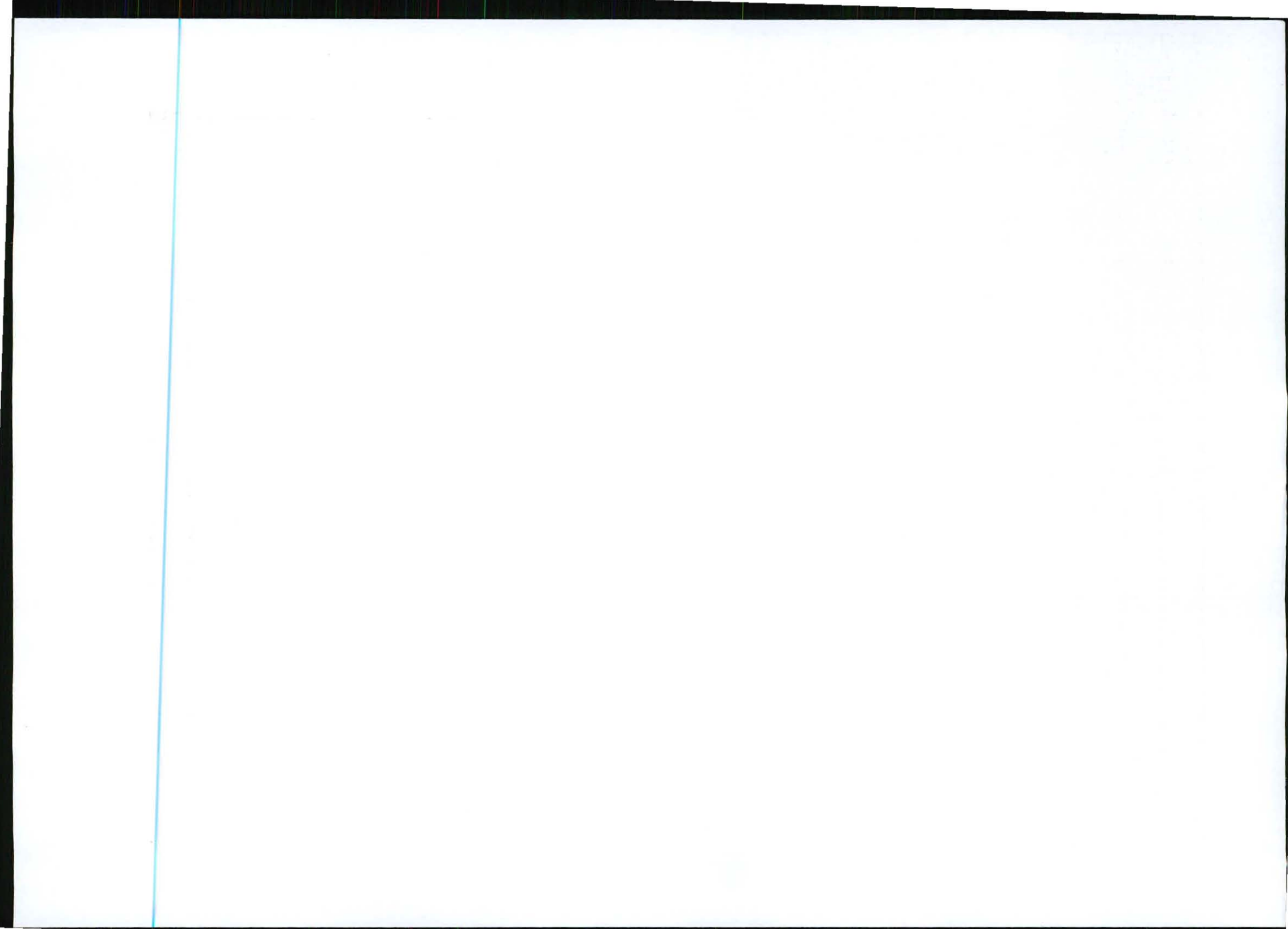
TOPOGRAPHY AND VILLAGES CLOSE TO GIYANI AIRPORT



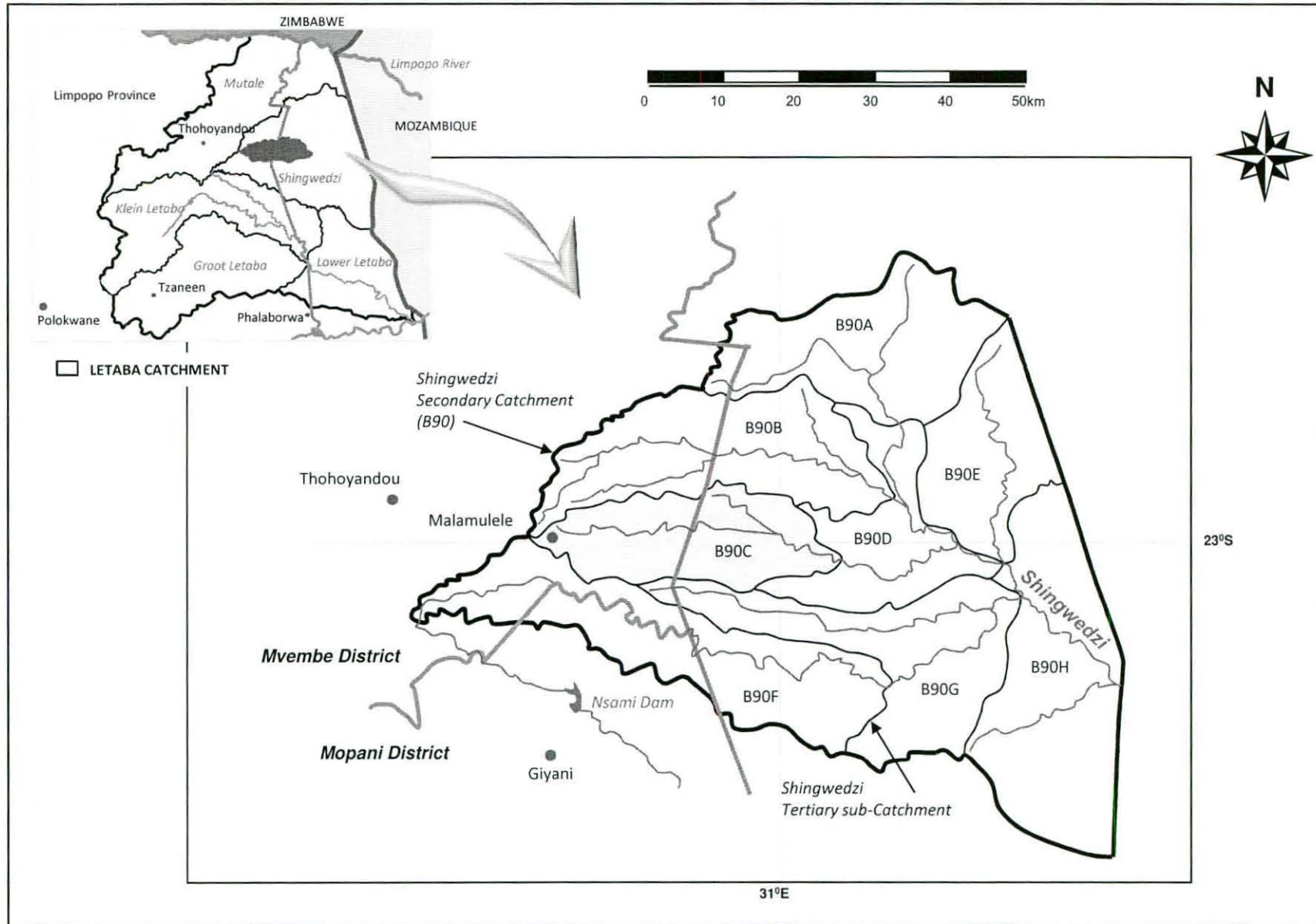
G.A. du Plessis
January 2011

Source: The Author

Figure 05



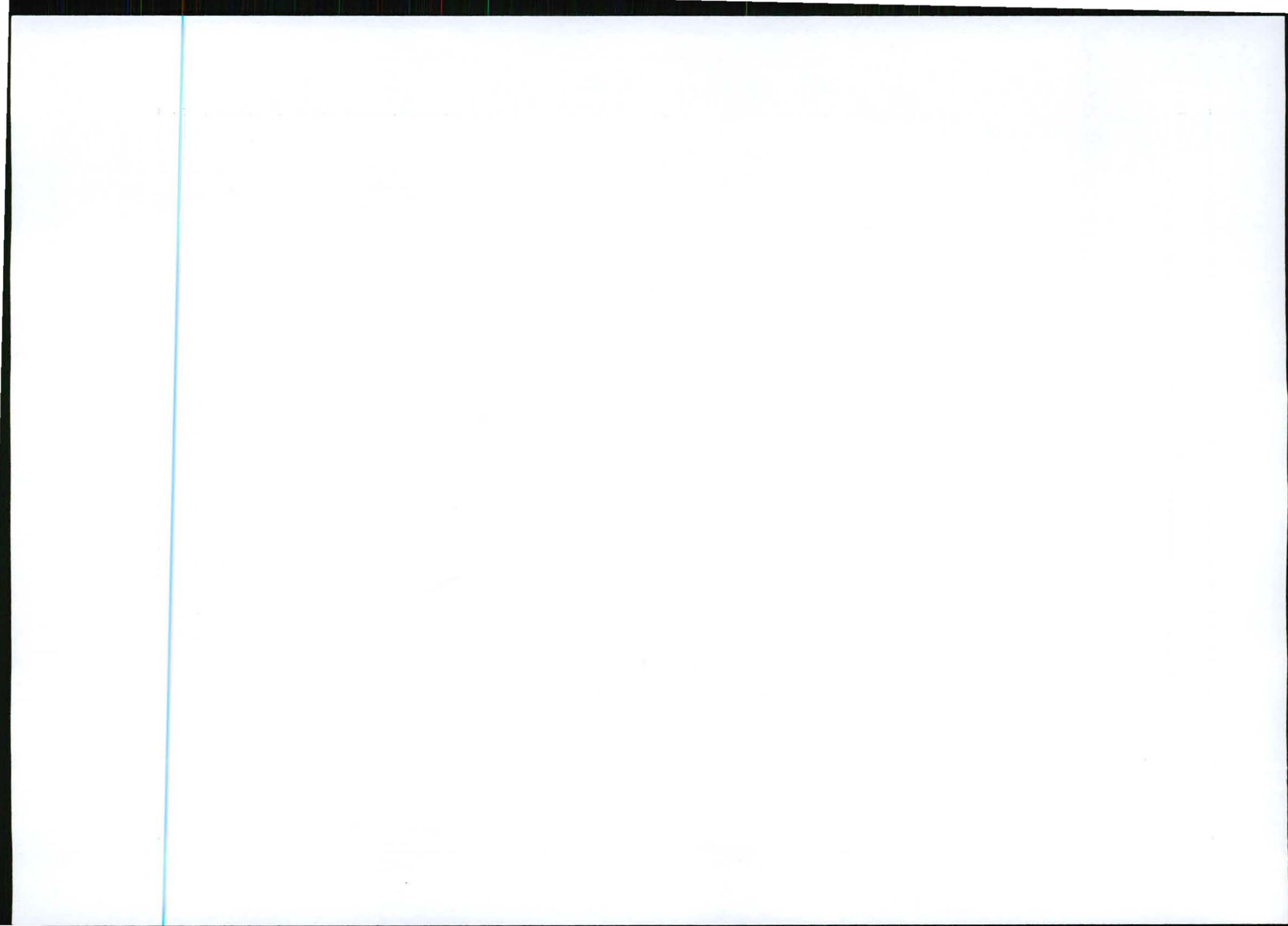
SHINGWEDZI CATCHMENT – Sub-catchment B90C for the Madonsi Project



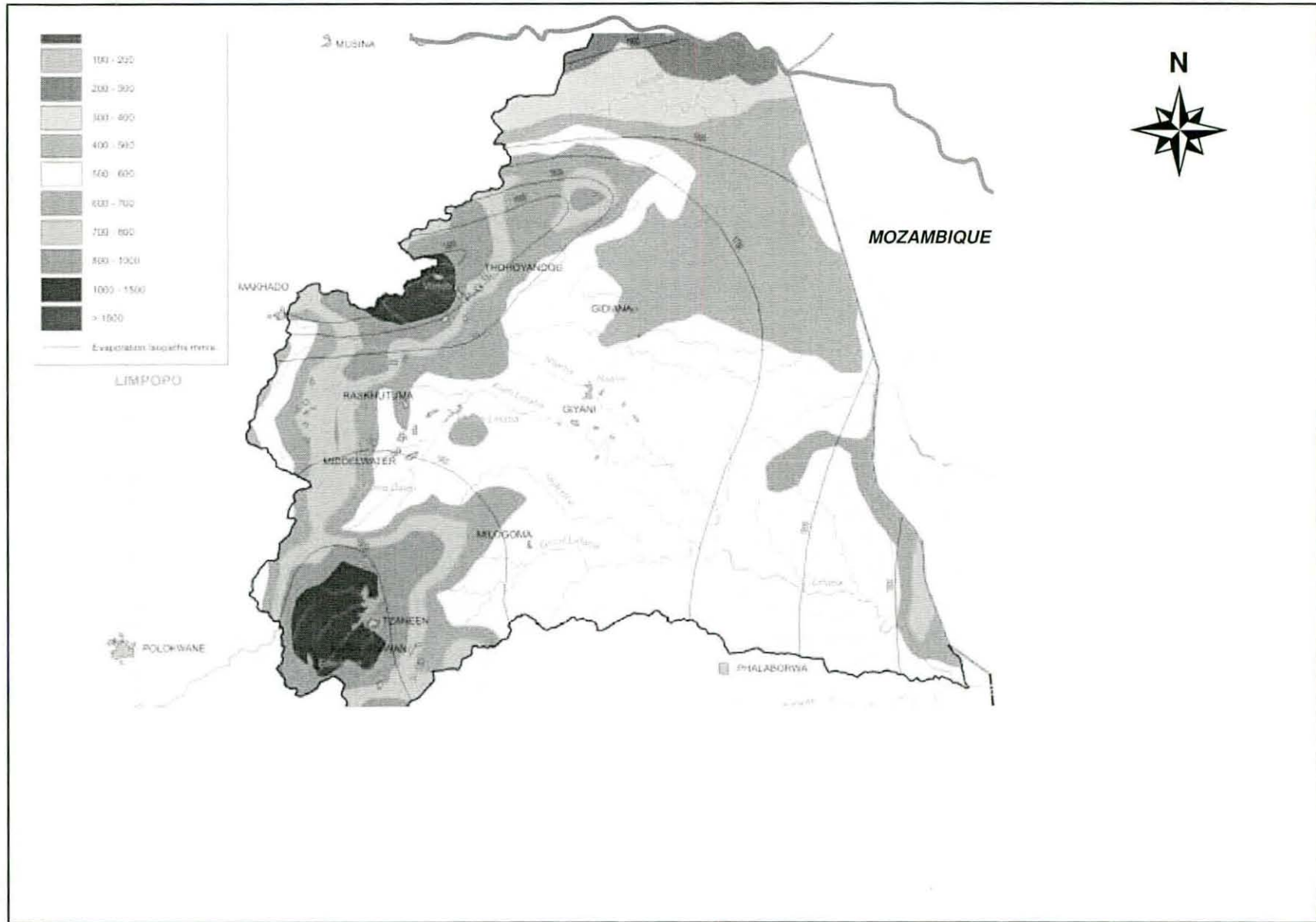
G.A. du Plessis
January 2011

Source: Department Water Affairs and Forestry

Figure 06



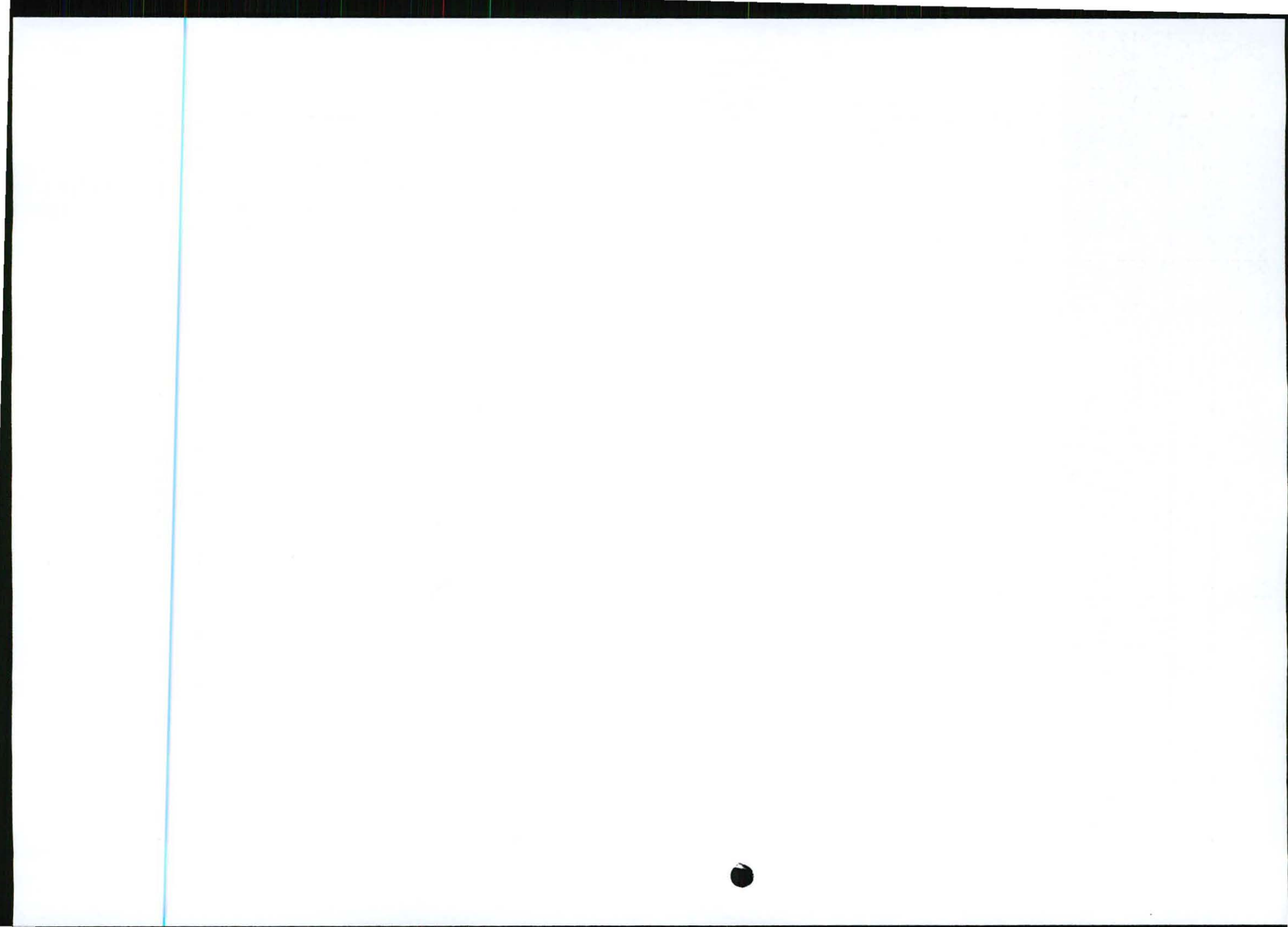
RAINFALL INTENSITY DISTRIBUTION IN THE LETABA CATCHMENT - LIMPOPO PROVINCE



G.A. du Plessis
January 2011

Source: Department Water Affairs and Forestry

Figure 07



WATER USAGE AND VEGETATION AT MADONSI PROJECT



One of the few wells present on the Madonsi project area; most are not functional



Typical pollution activities in the region



Vegetation from the mine overlooking towards the Mchipise village at the western boundary of the Madonsi project (Dec 2010)

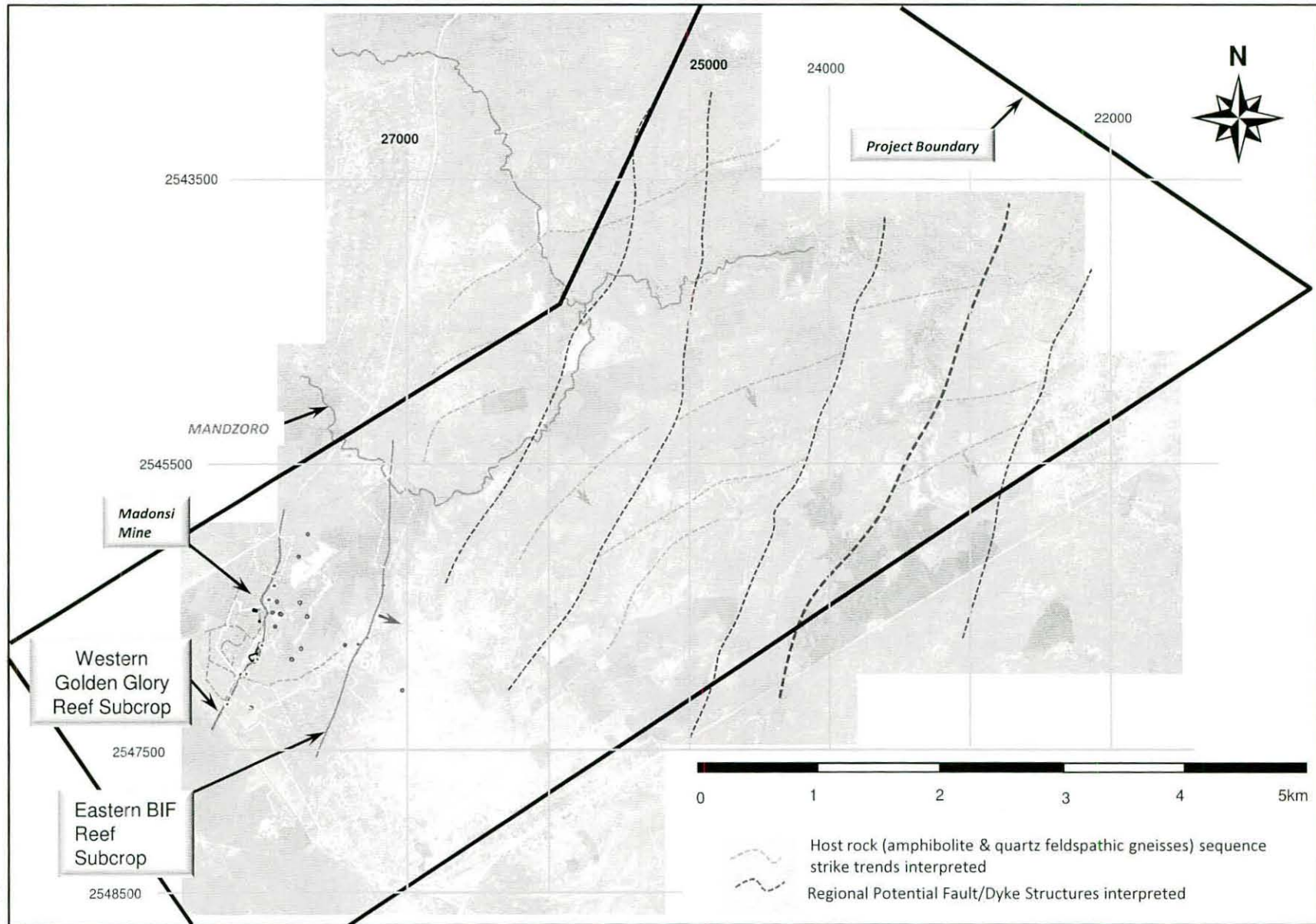


Vegetation in the vicinity of the Madonsi dumps



Vegetation proximal to the Mandzoro river bed

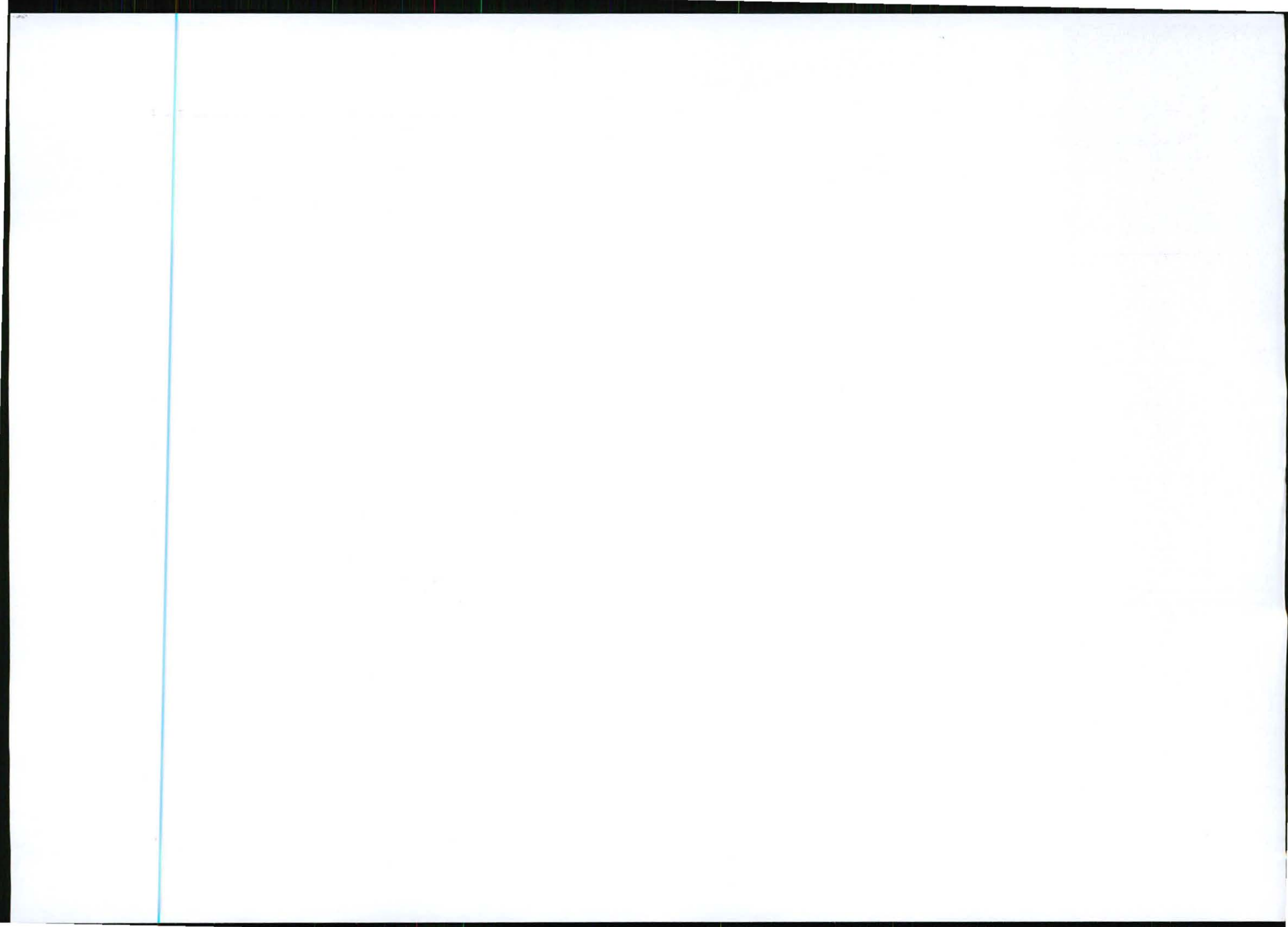
REGIONAL FAULT STRUCTURE INTERPRETATION



G.A. du Plessis
January 2011

Source: Google Map and interpretation by the Author

Figure 09



REDUNDANT OLD MINE INFRASTRUCTURE AT THE MADONSI PROJECT



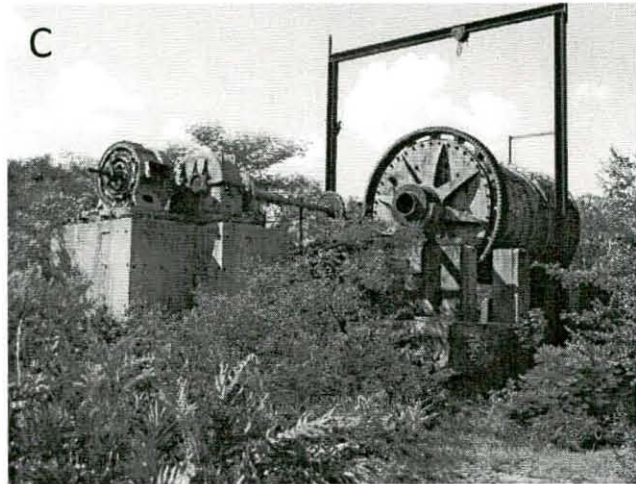
A

Remains of the Manville gold plant infrastructure north Madonsi mine village



B

Redundant residence as most of the other houses in the Madonsi mine village



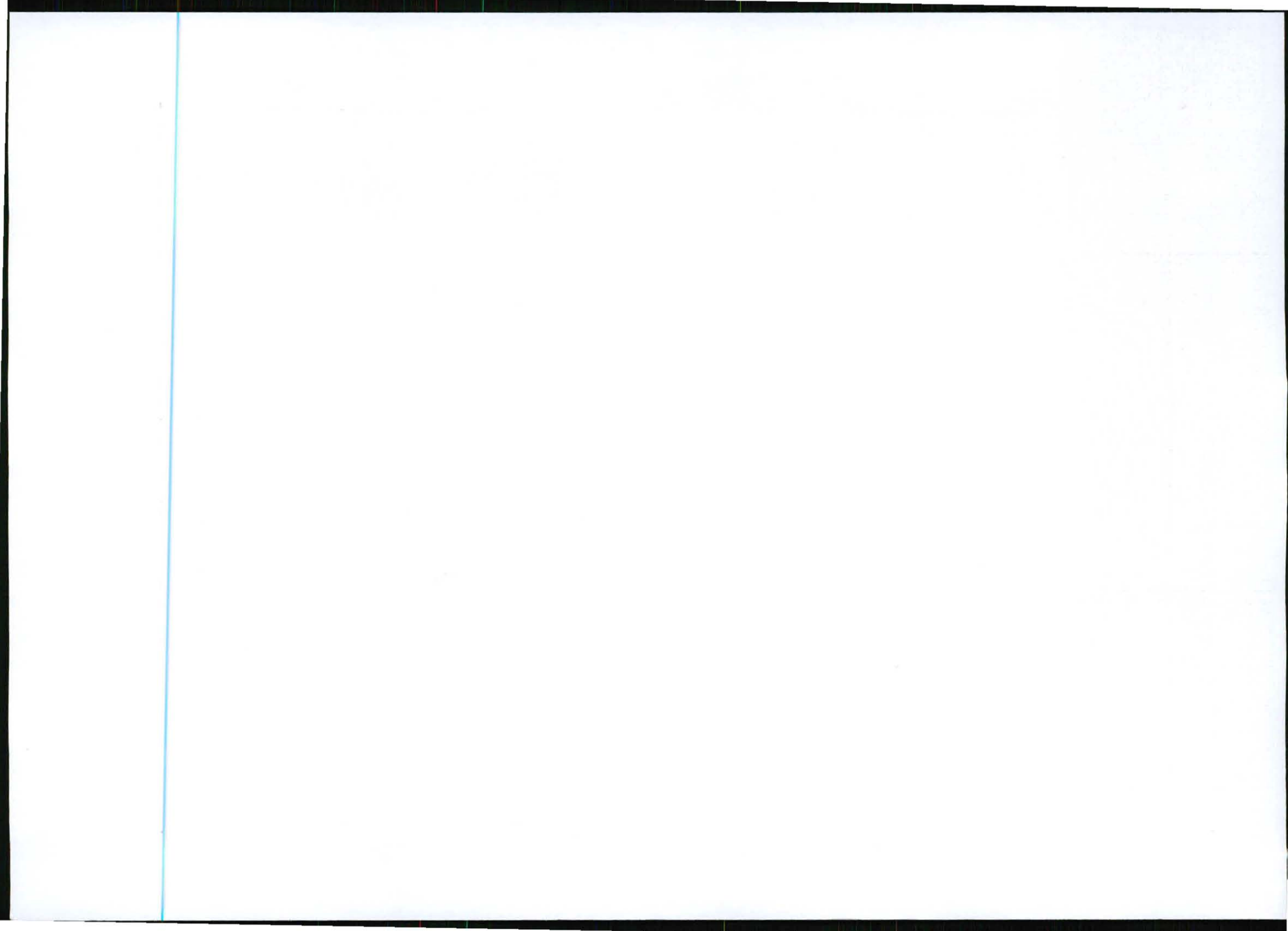
C

The remains of the old gold ball mill next to No 2 Shaft



D

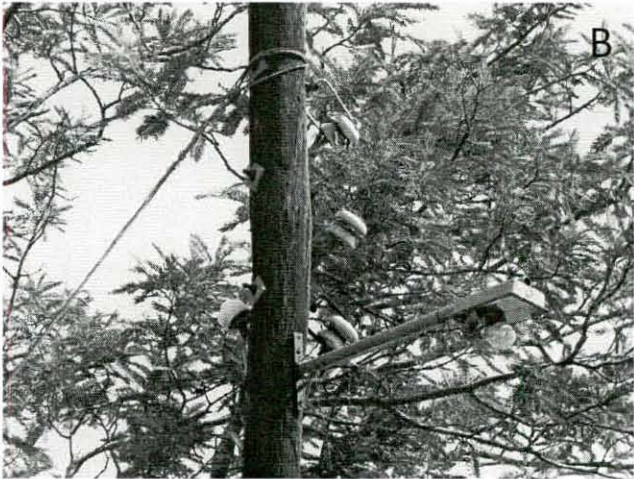
The old Madonsi mine offices next the closed up No 2 Shaft. This office block could be renovated for reuse



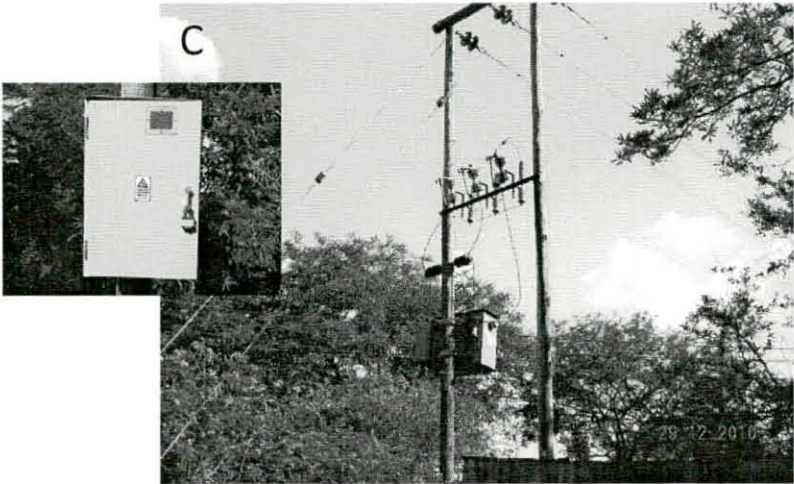
POWER SUPPLY INFRASTRUCTURE AT THE MADONSI PROJECT



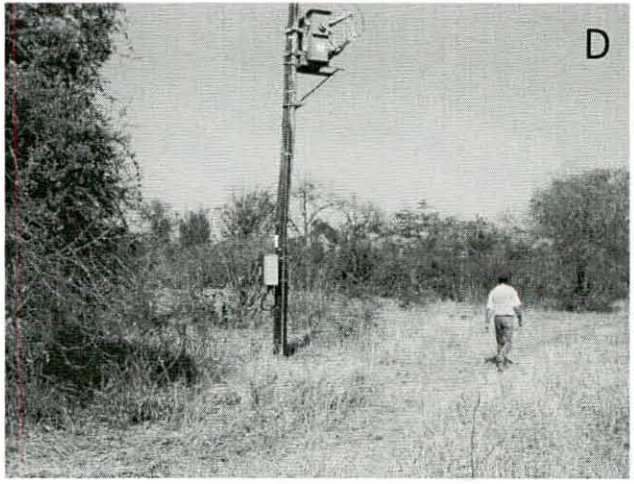
Power supply present to the north of the Madonsi village to the old Manville gold operations



Power cables stripped



Power supply to the Madonsi village at the building where the substation has been removed

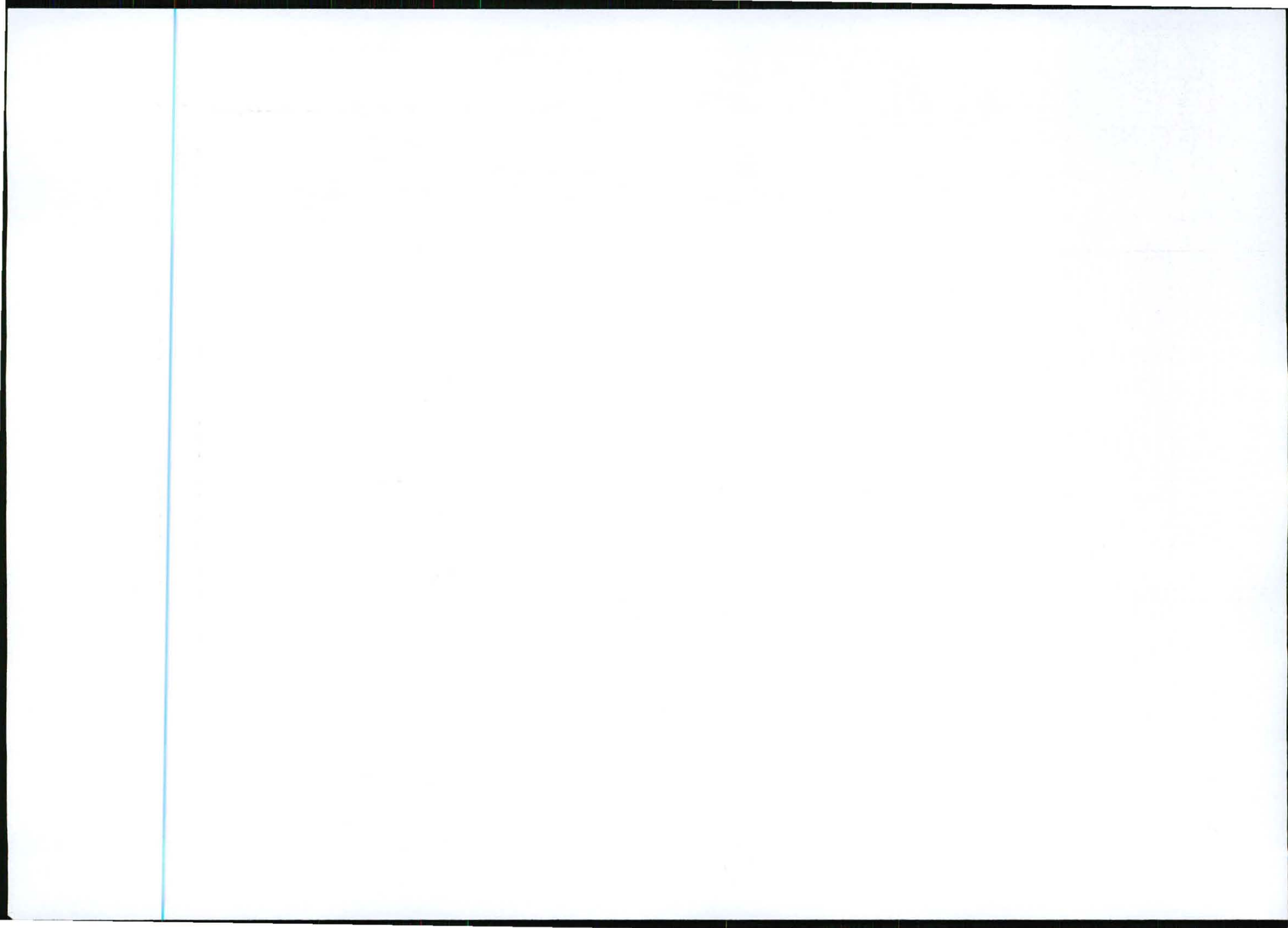


Power reticulation and transformer still intact proximal to water well to the north of the old mine village

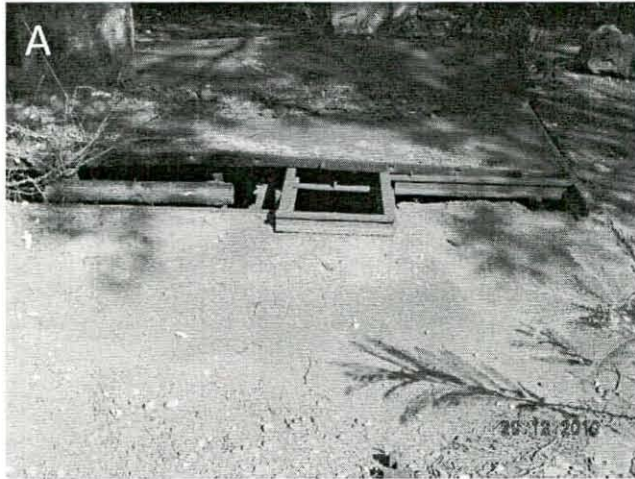
G.A. du Plessis
January 2011

Source: The Author

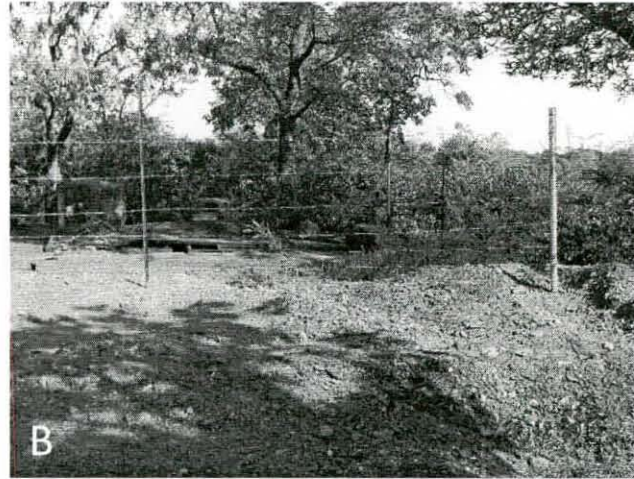
Figure 11



OLD SHAFT INFRASTRUCTURE AT THE MADONSI PROJECT



The old No 3 Decline Shaft access been covered



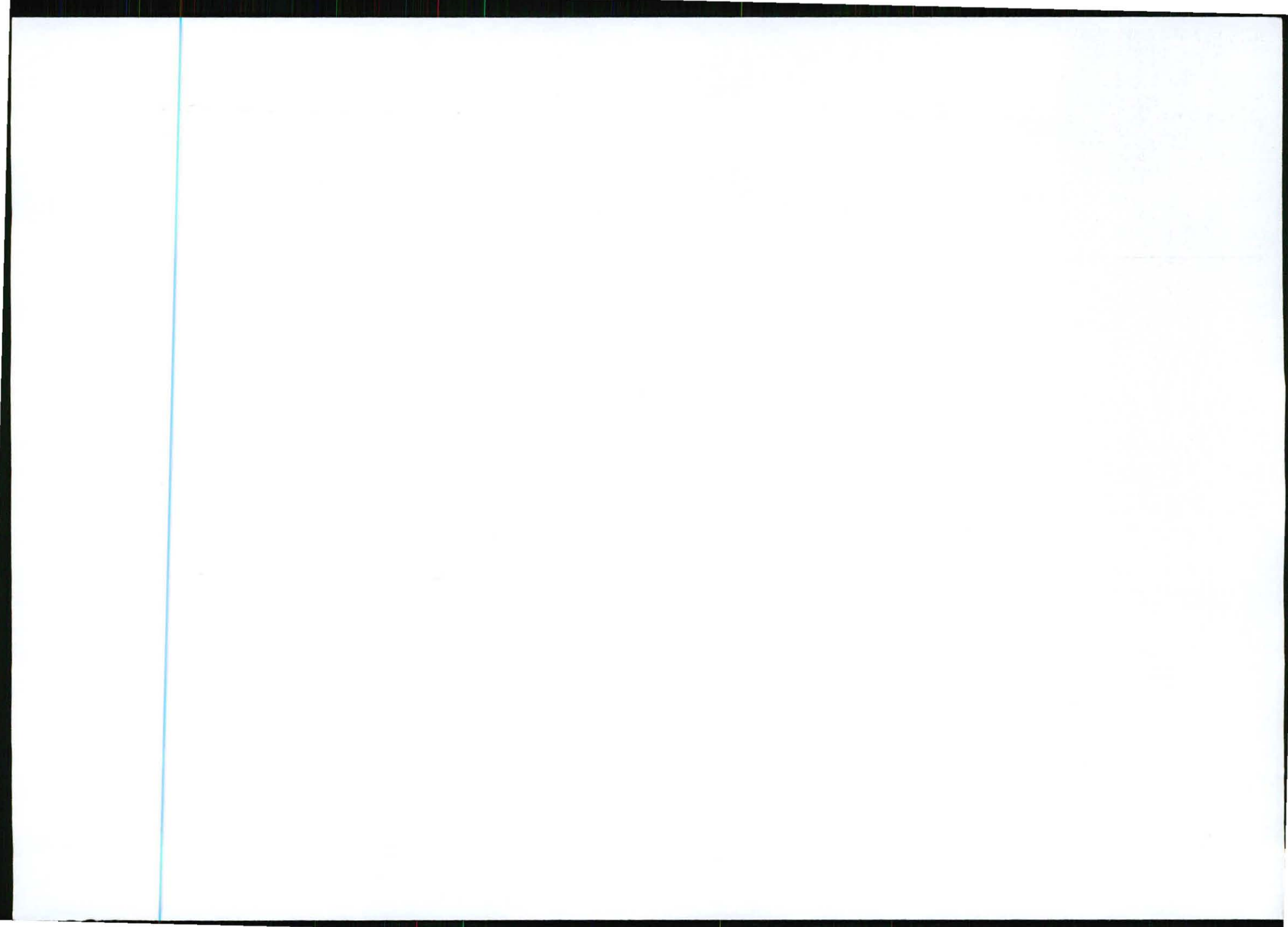
The old No 3 Decline Shaft access been fenced by the Madonsi Council



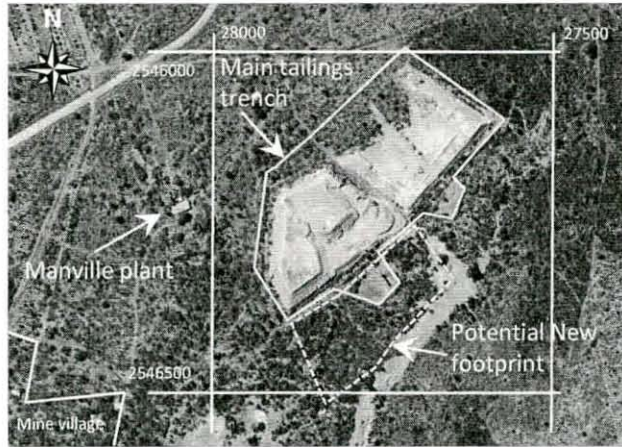
Madonsi old No 10 Shaft



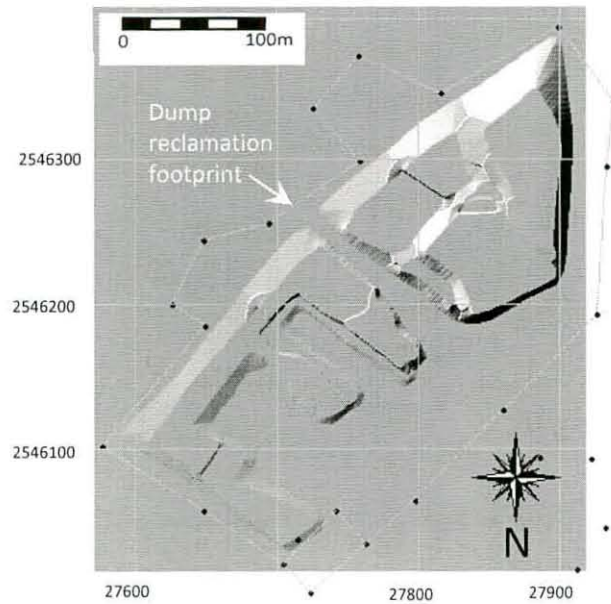
Madonsi old No 9 Shaft



HISTORICAL TAILINGS DUMPS AT THE MADONSI PROJECT



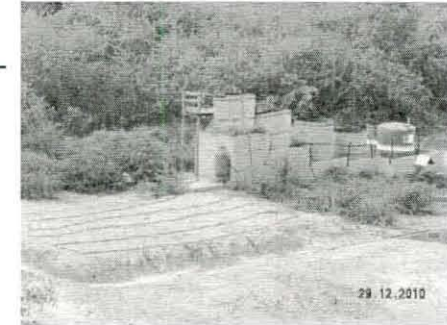
Source: Google



Source: Modeling by The Author (July 2004)

Survey statistics on the main tailings dumps

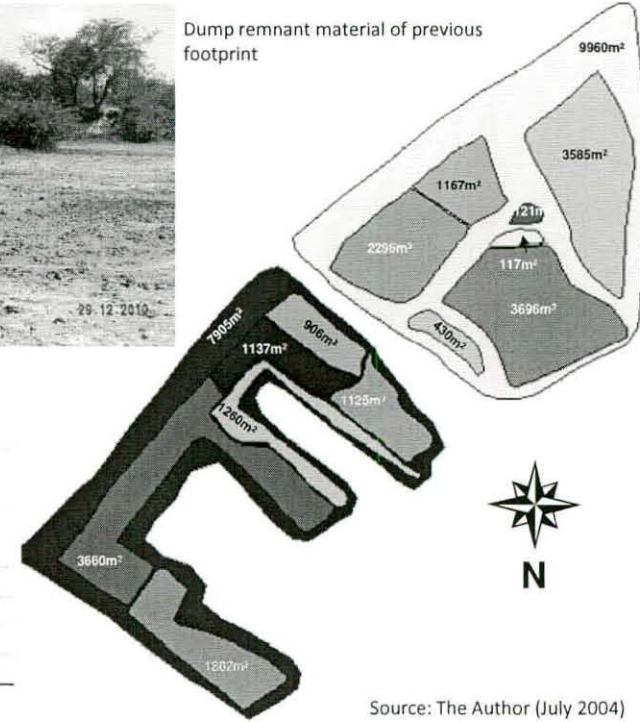
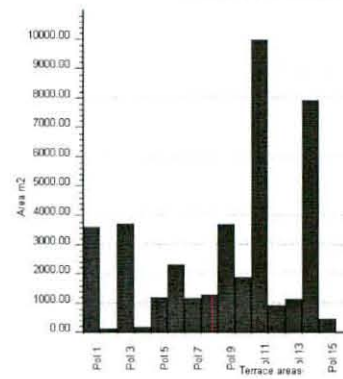
29 July 04	m2	depth (m)	m3	sg	tons
area1	3,585	13.4	48,037	1.9	91,271
area2	122	9.0	1,095	1.9	2,080
area3	3,697	12.0	44,358	1.9	84,281
area4	177	10.0	1,766	1.9	3,356
area5	1,167	8.0	9,339	1.9	17,743
area6	2,296	5.0	11,478	1.9	21,809
area7	1,137	6.0	6,823	1.9	12,964
area8	1,261	4.0	5,043	1.9	9,581
area9	3,661	6.5	23,793	1.9	45,207
area10	1,862	5.1	9,495	1.9	18,040
area11	9,960	7.0	69,722	1.9	132,472
area12	907	6.0	5,441	1.9	10,338
area13	1,126	6.0	3,378	1.9	6,418
area14	7,905	2.0	7,905	1.9	15,020
area15	430	8.0	1,720	1.9	3,269
	39,291		249,394	1.9	473,849



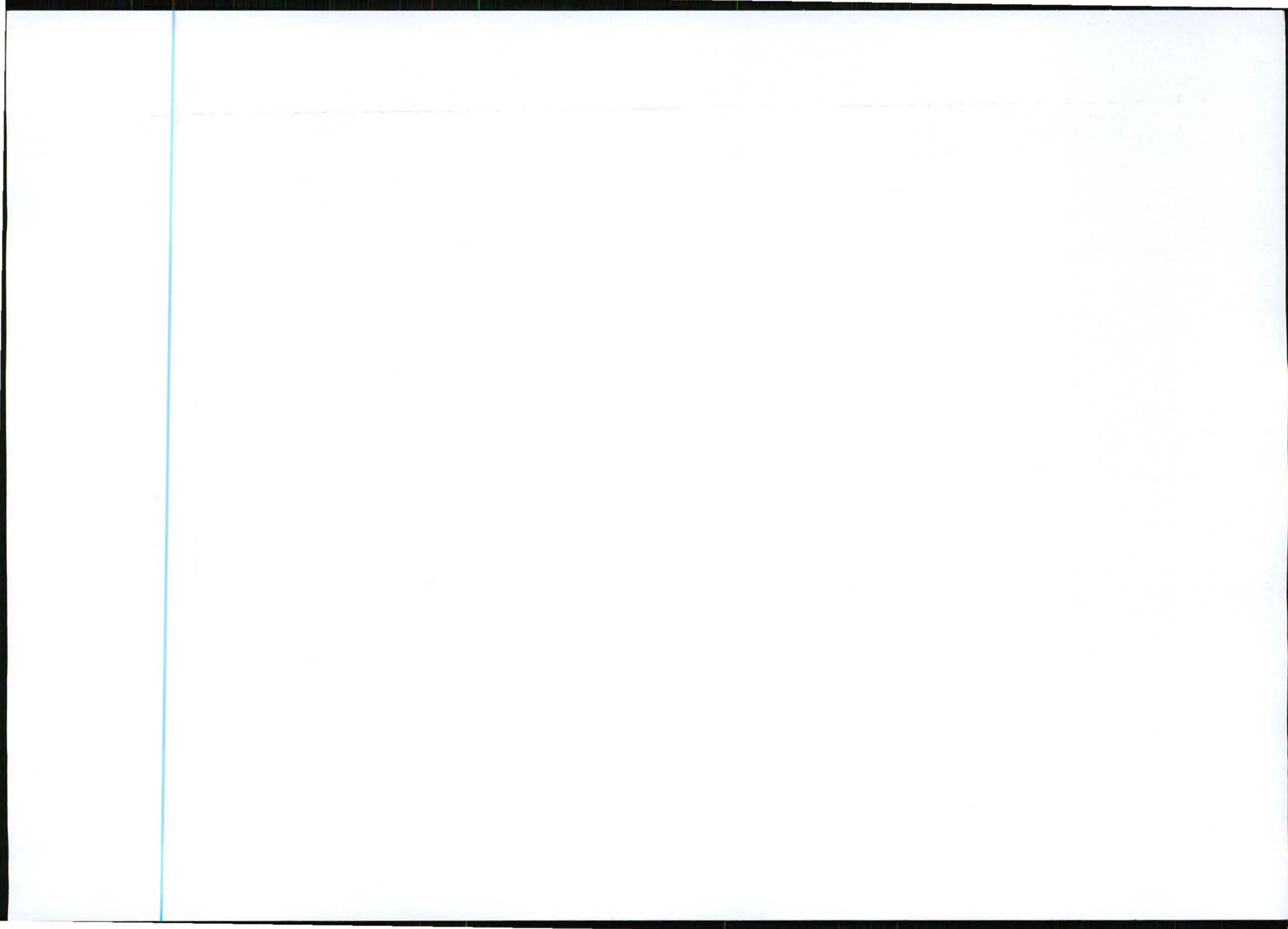
Infrastructure left on recent leaching operation proximal to the northern dump



Dump remnant material of previous footprint



Source: The Author (July 2004)



QUARTZ SHEAR ZONES MINED AT THE MADONSI PROJECT and DOMINANT SOILS



A typical Glenrosa soil profile in the pit excavation the east of No 2 Shaft.



A typical Hutton soil along the road towards the Manville plant site. The majority of Madonsi project low level areas is characterised by this soil Form.

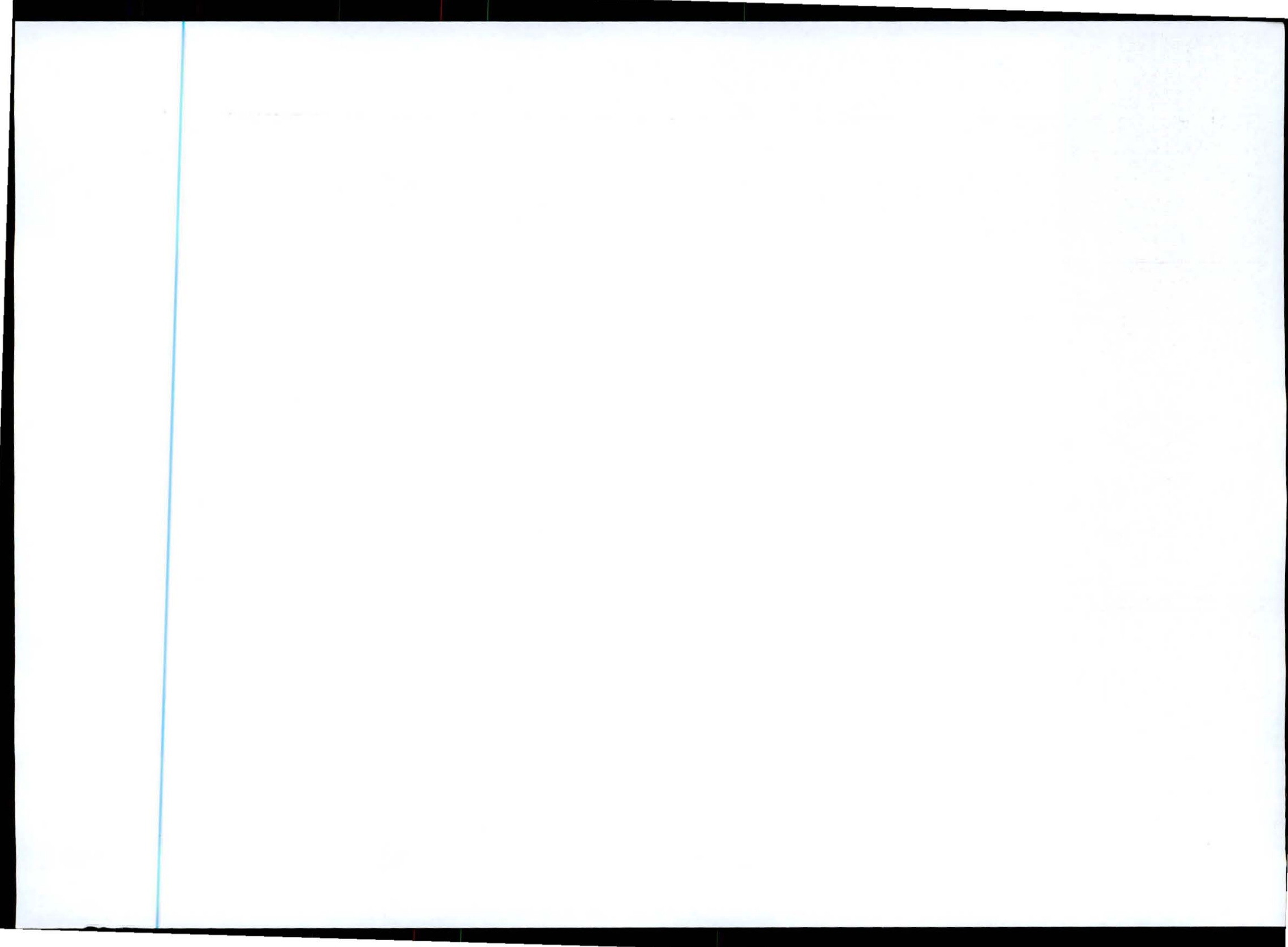


An exposure of the **Golden Glory 1 Reef** in the excavation pit adjacent No 1 shaft to the east of the old office block.



Source: The Author (Dec2010)

Exposures of potentially the **A or B Reef** in the excavation pit adjacent No 1 shaft.

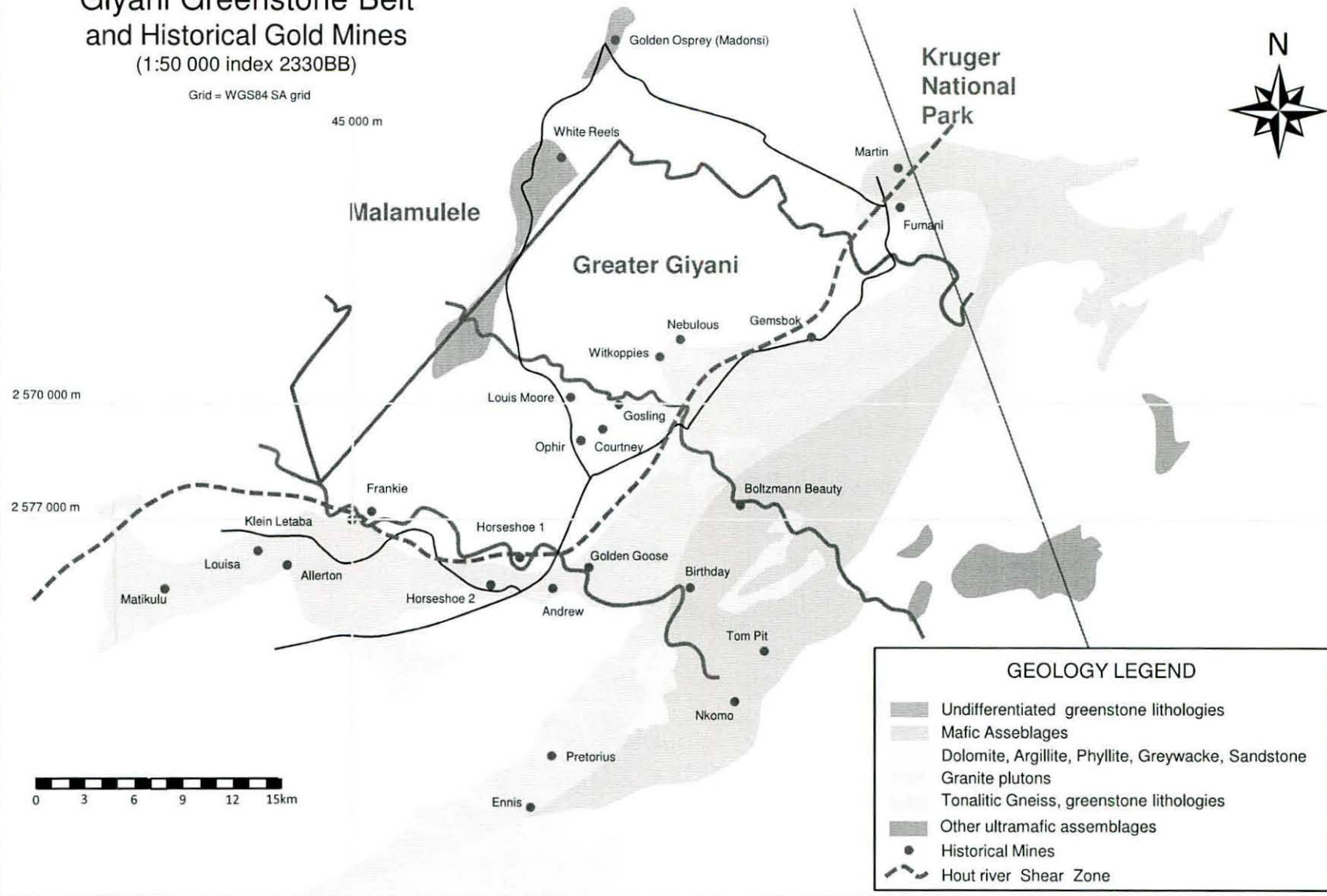


REGIONAL GEOLOGY

Giyani Greenstone Belt and Historical Gold Mines (1:50 000 index 2330BB)

Grid = WGS84 SA grid

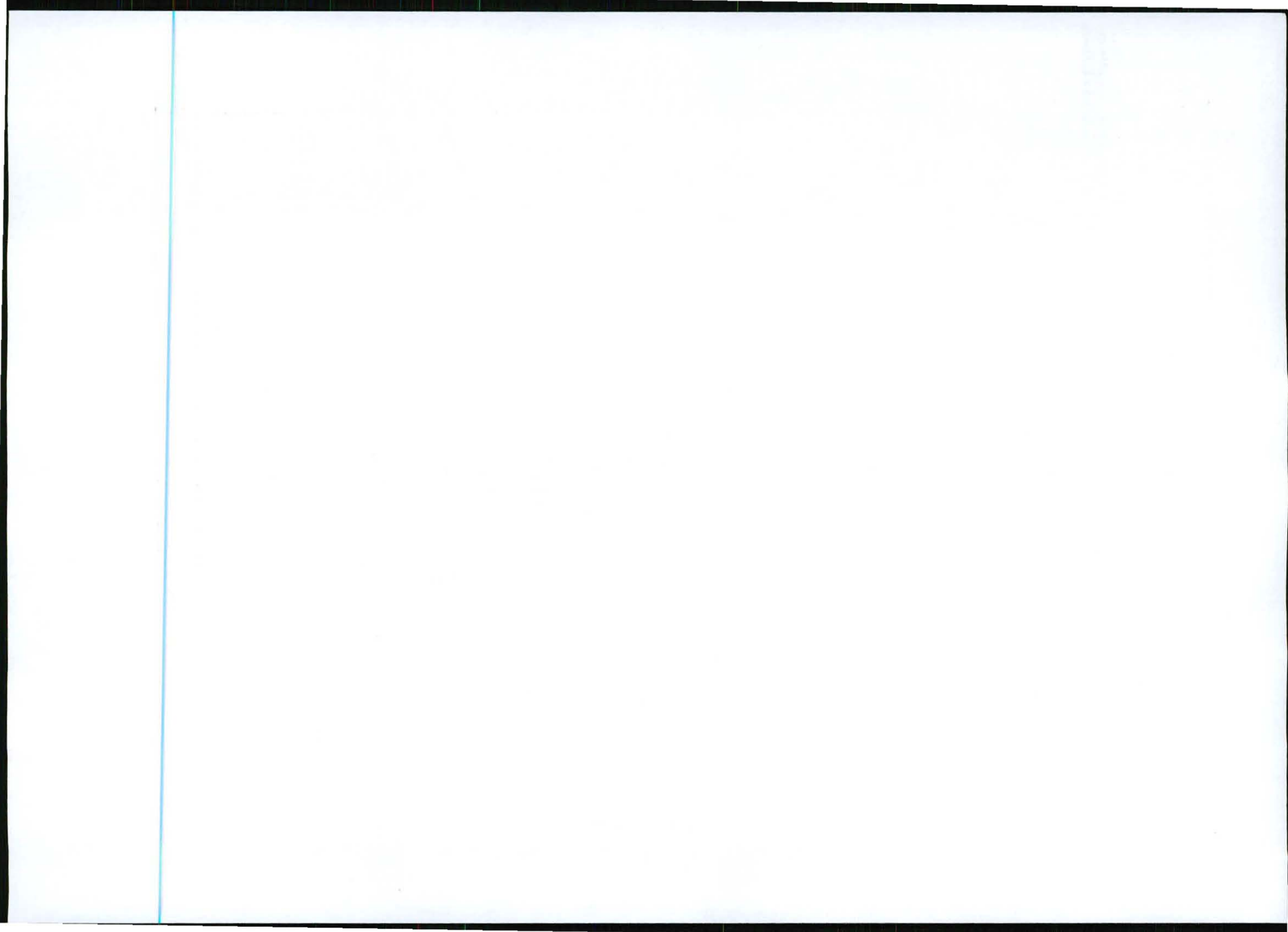
45 000 m



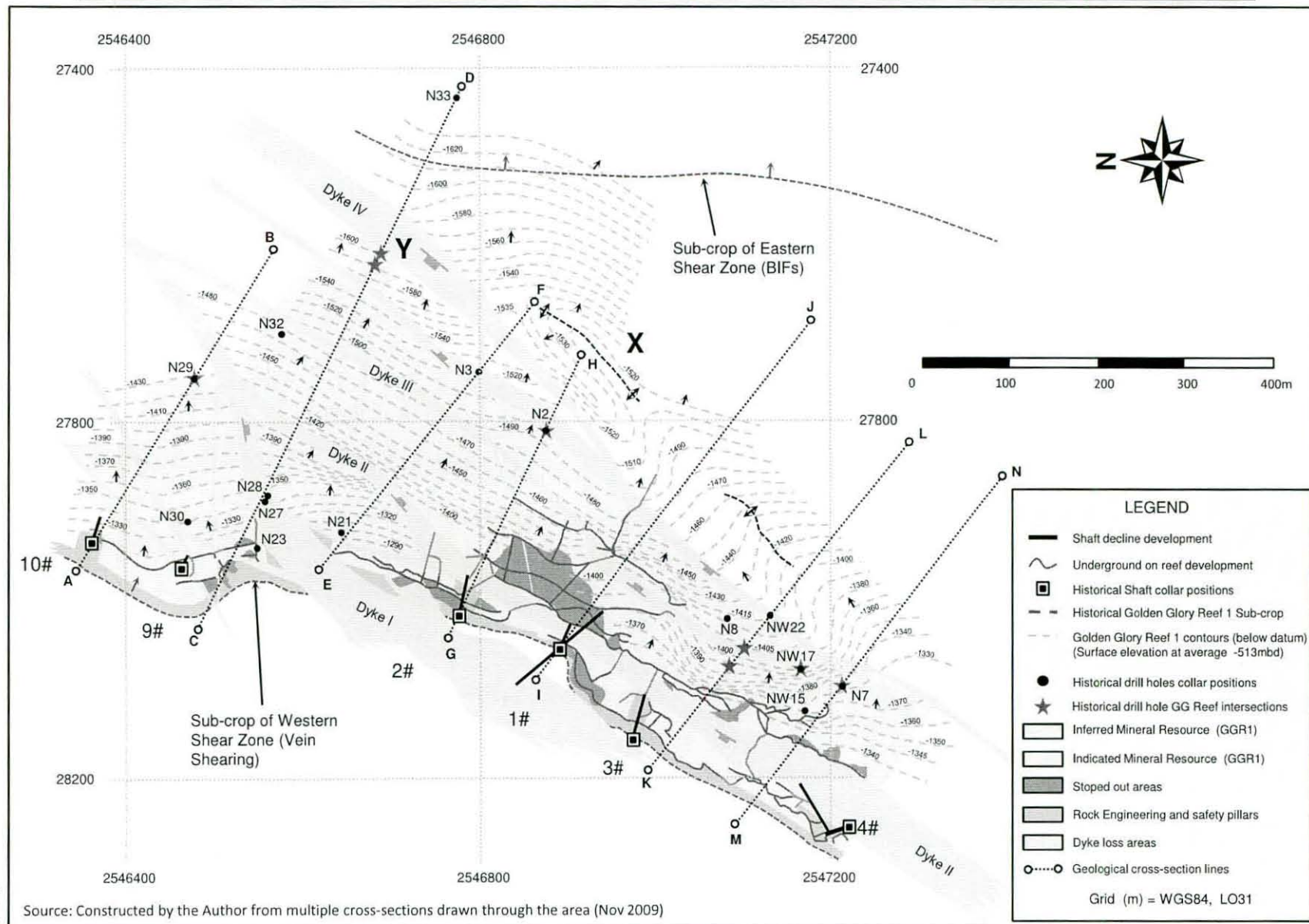
Source: The Author and Ore Deposits of SA

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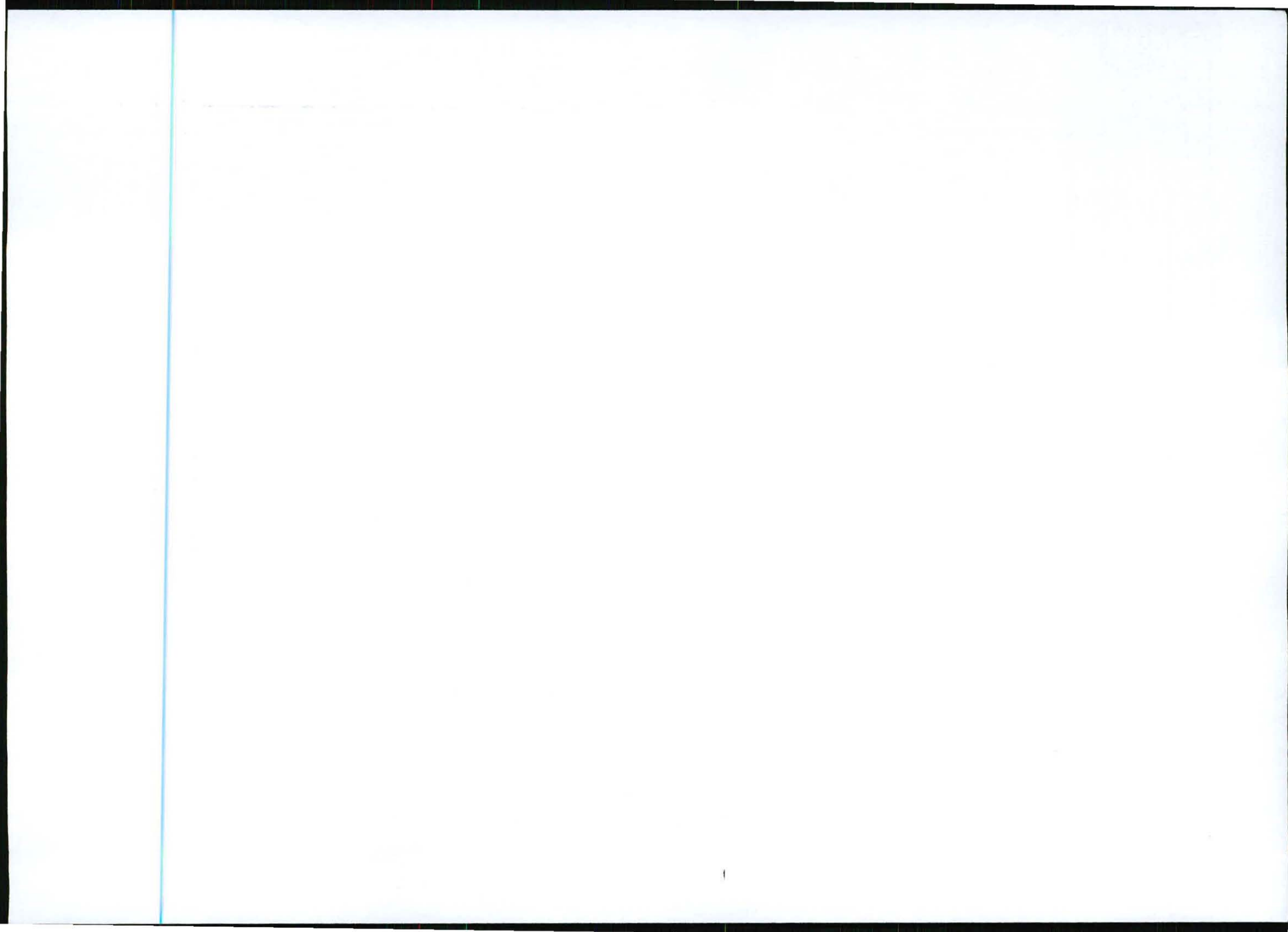
Figure 15



GEOLOGICAL STRUCTURE FOR THE GOLDEN GLORY REEF NO 1 AT THE MADONSI MINE



Source: Constructed by the Author from multiple cross-sections drawn through the area (Nov 2009)

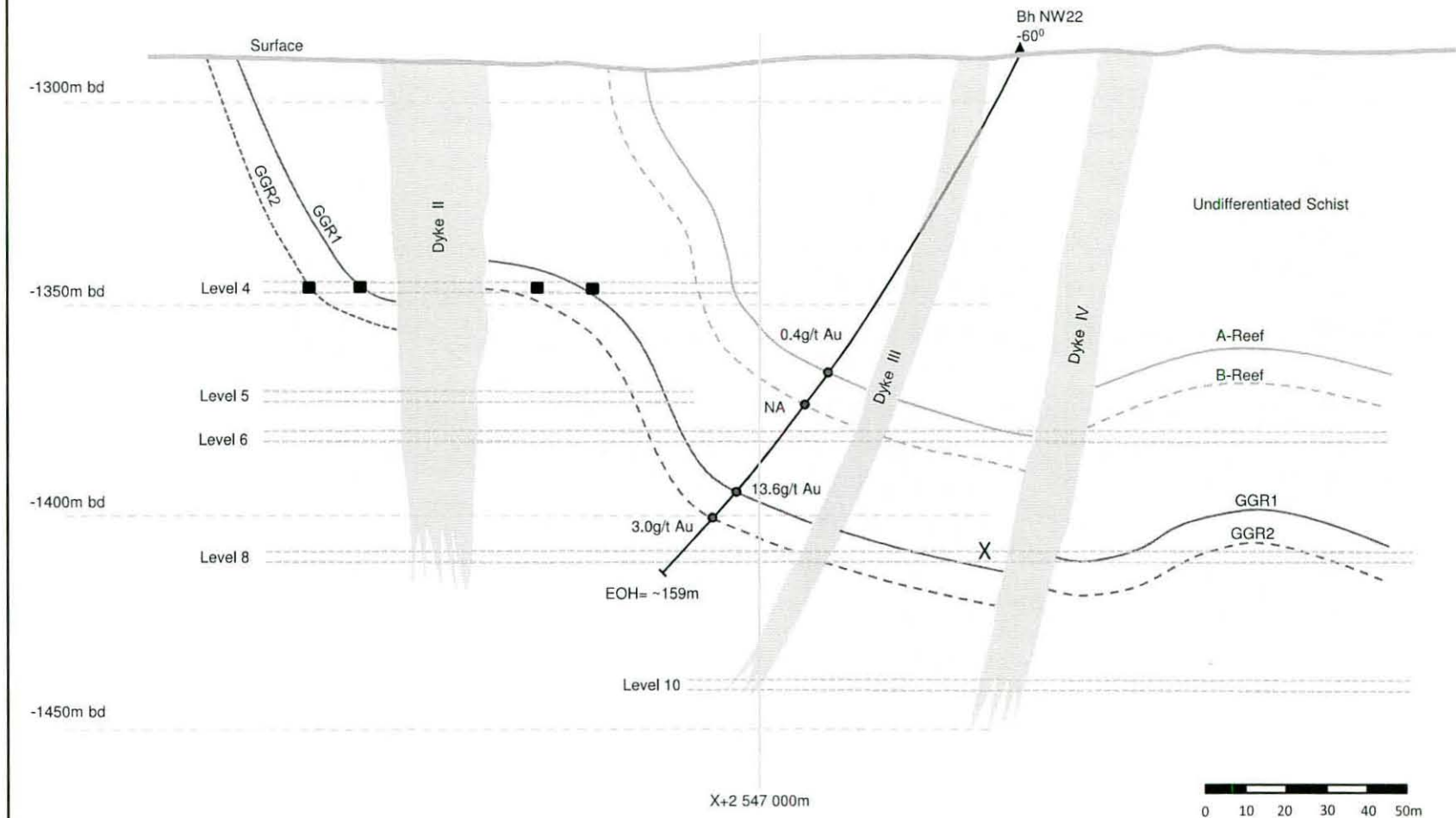


GEOLOGICAL CROSS-SECTION THROUGH THE MADONSI MINE

SECTION VIEW
Geological Interpretation

Section drawn along line KL (See also Figure 16 and Appendix 7)

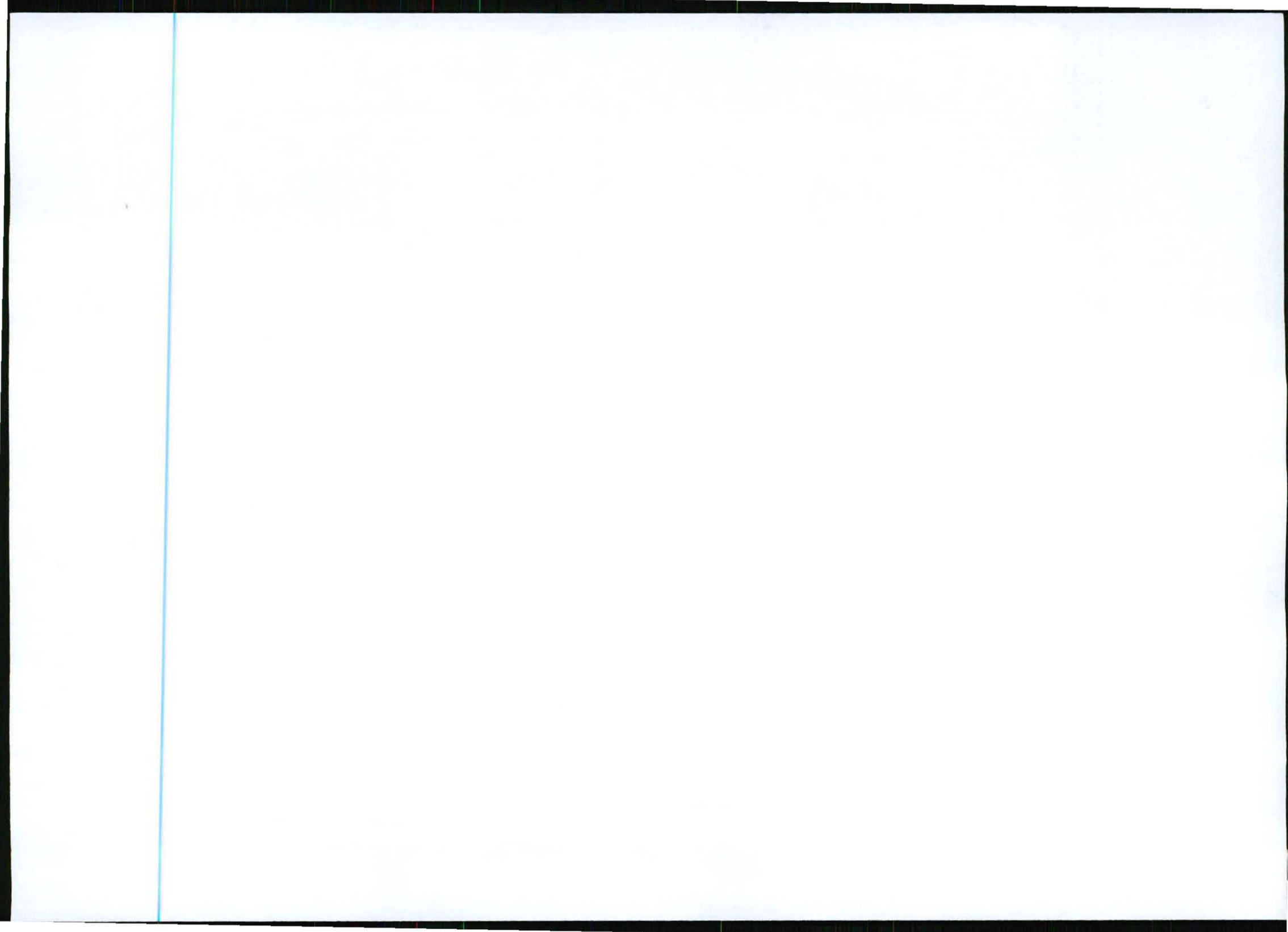
EAST →



Source: Constructed by the Author (Nov 2009)

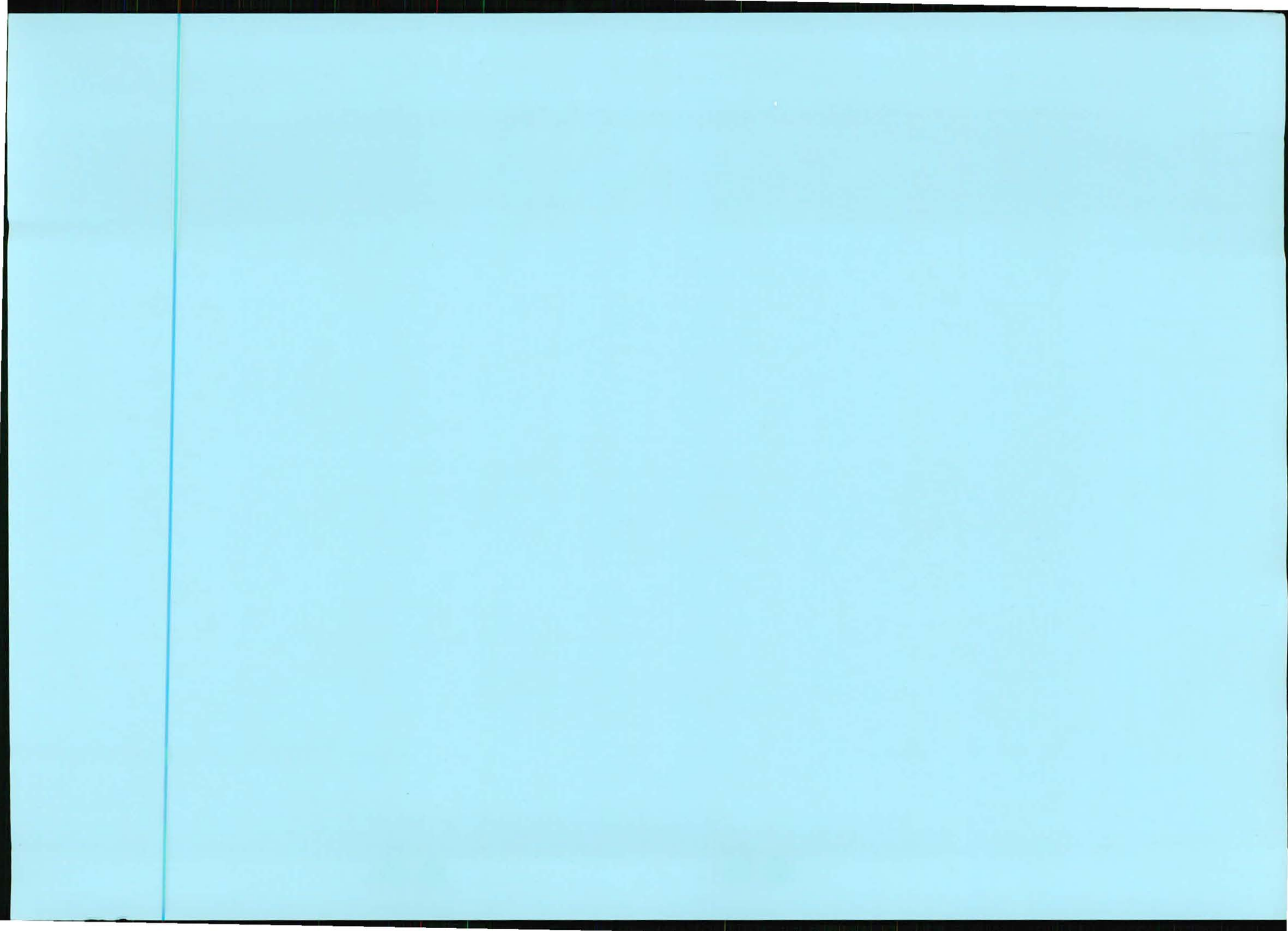
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January 2011

Figure 17

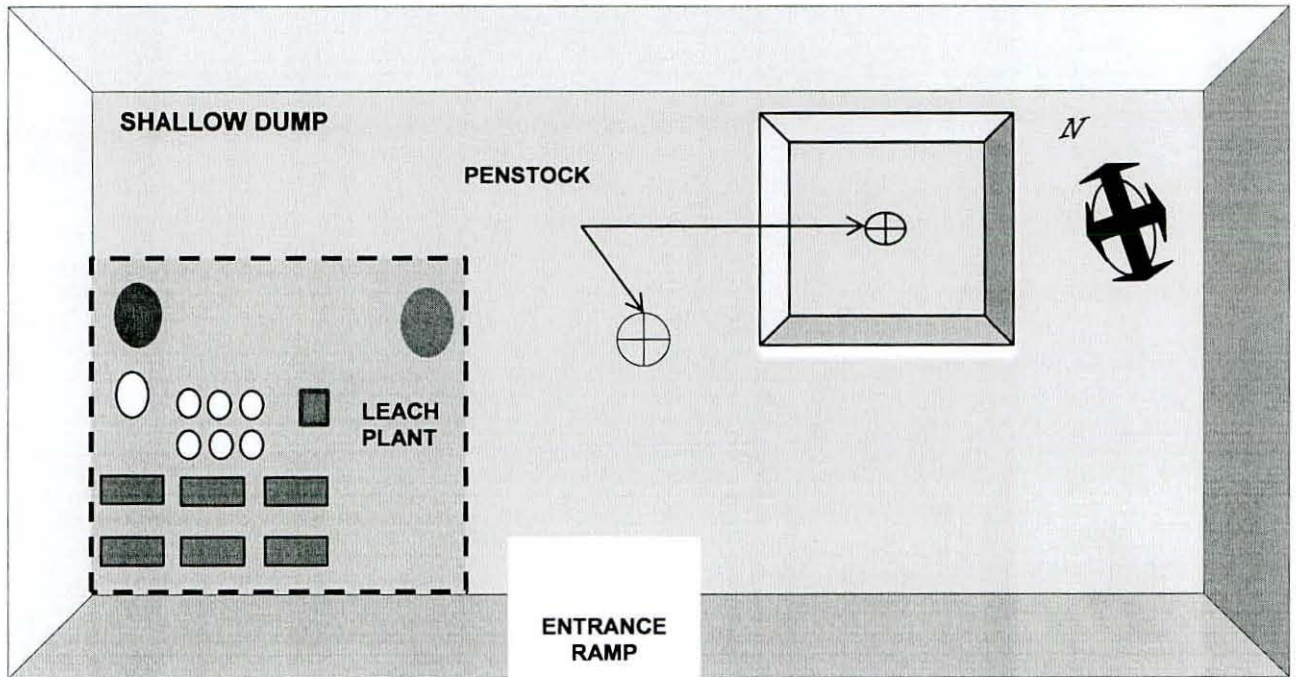


ANNEXURE D

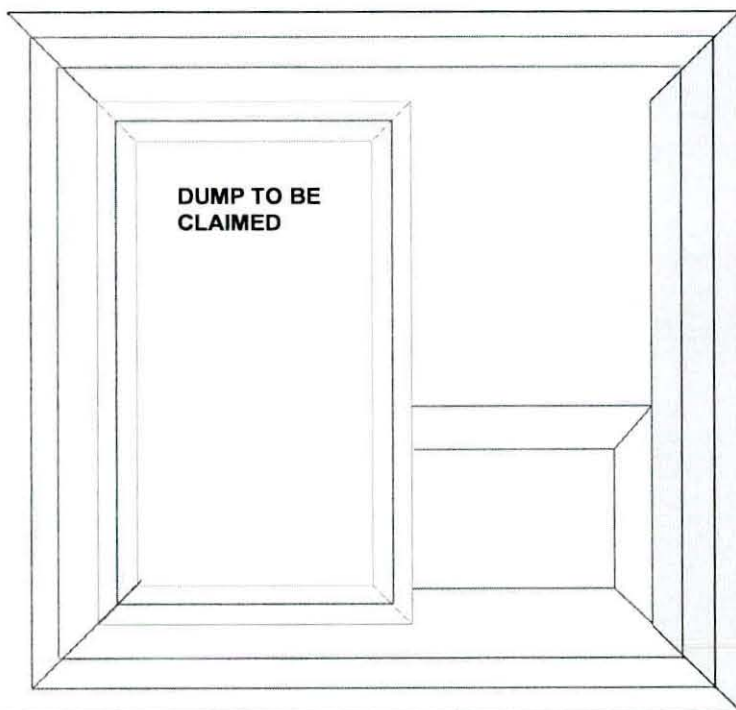
PLAN OF PROCESSING PLANT

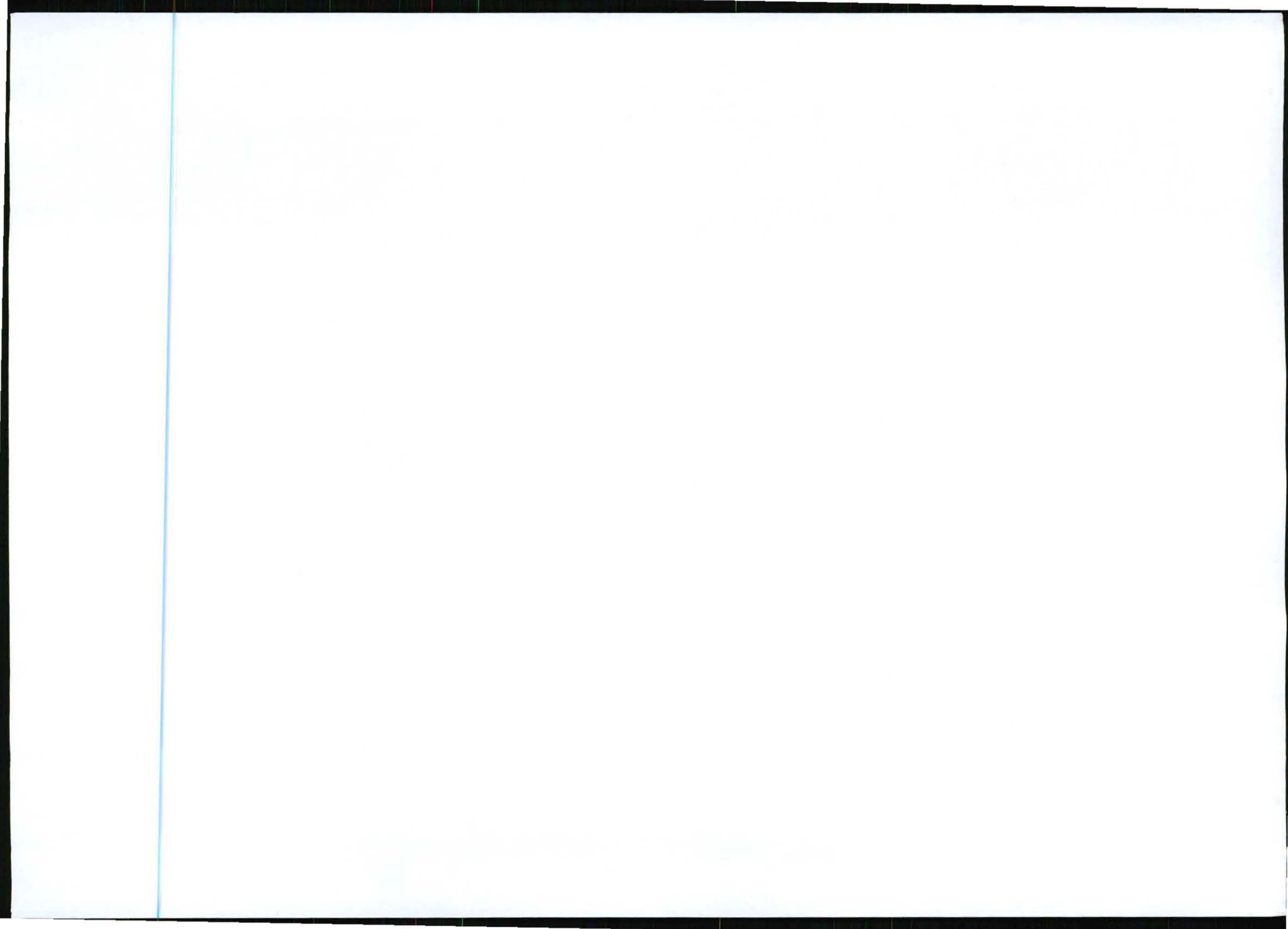


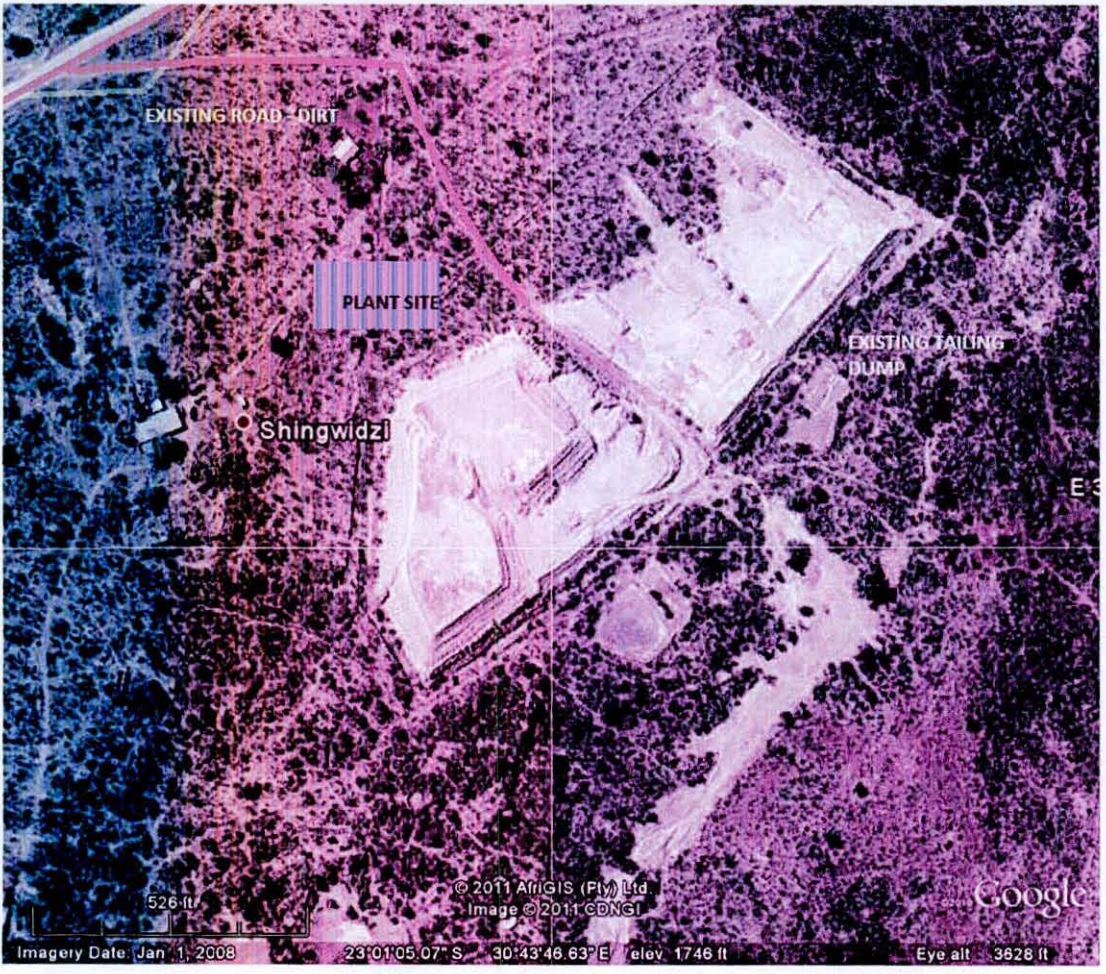
ANNEXURE "D"

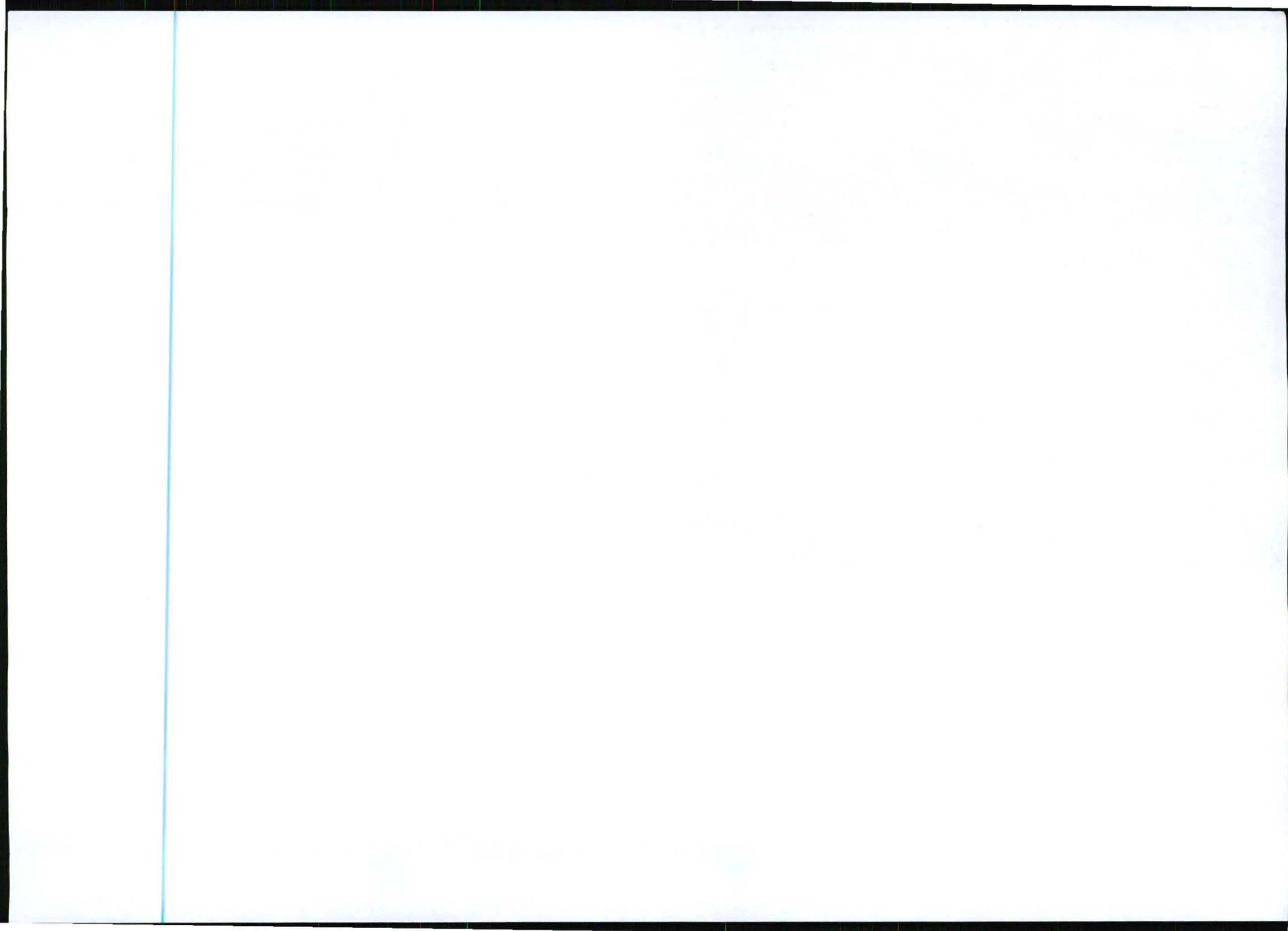


EXISTING DIRT
ACCESS ROAD



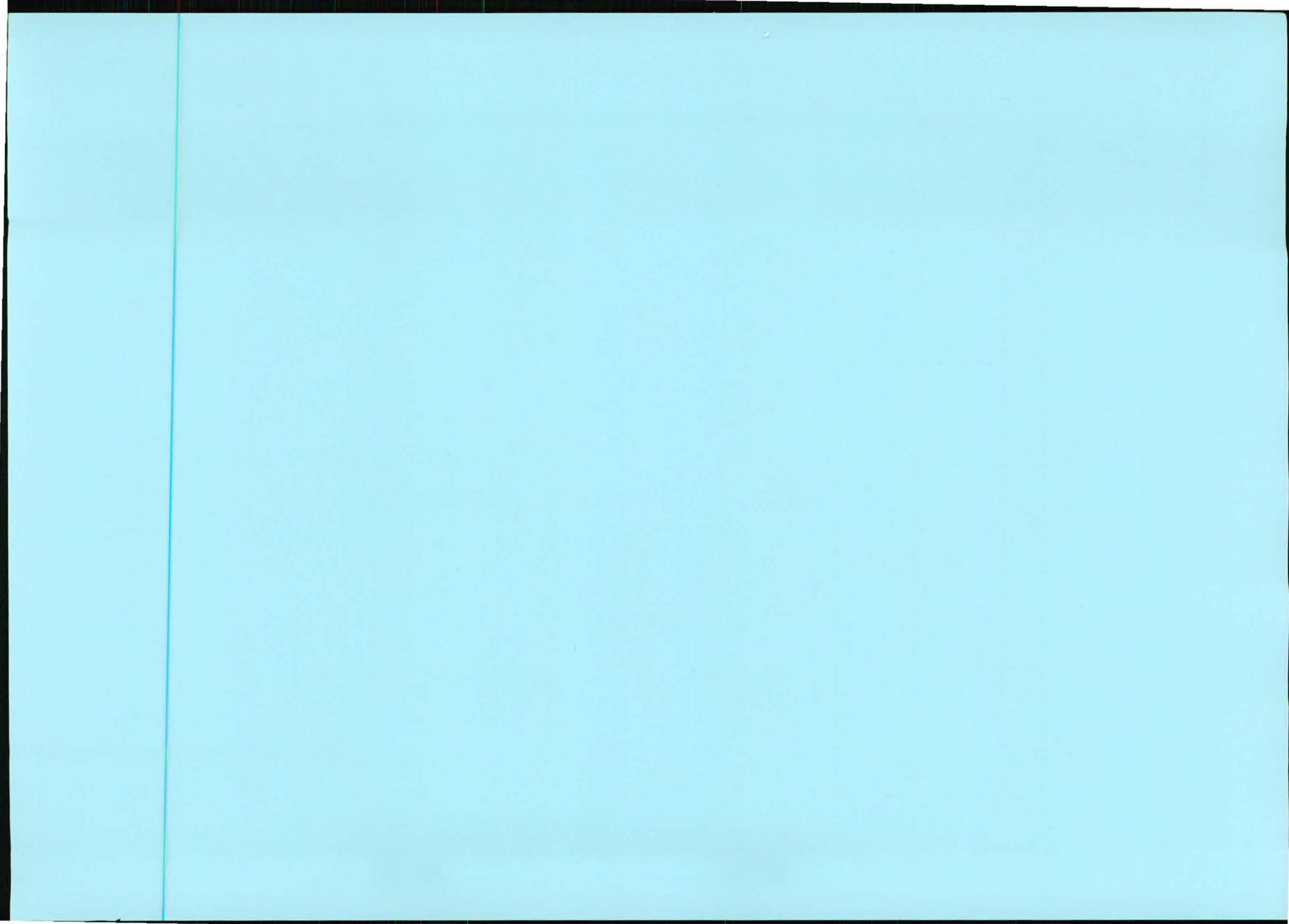






ANNEXURE E

FINANCIAL CALCULATION



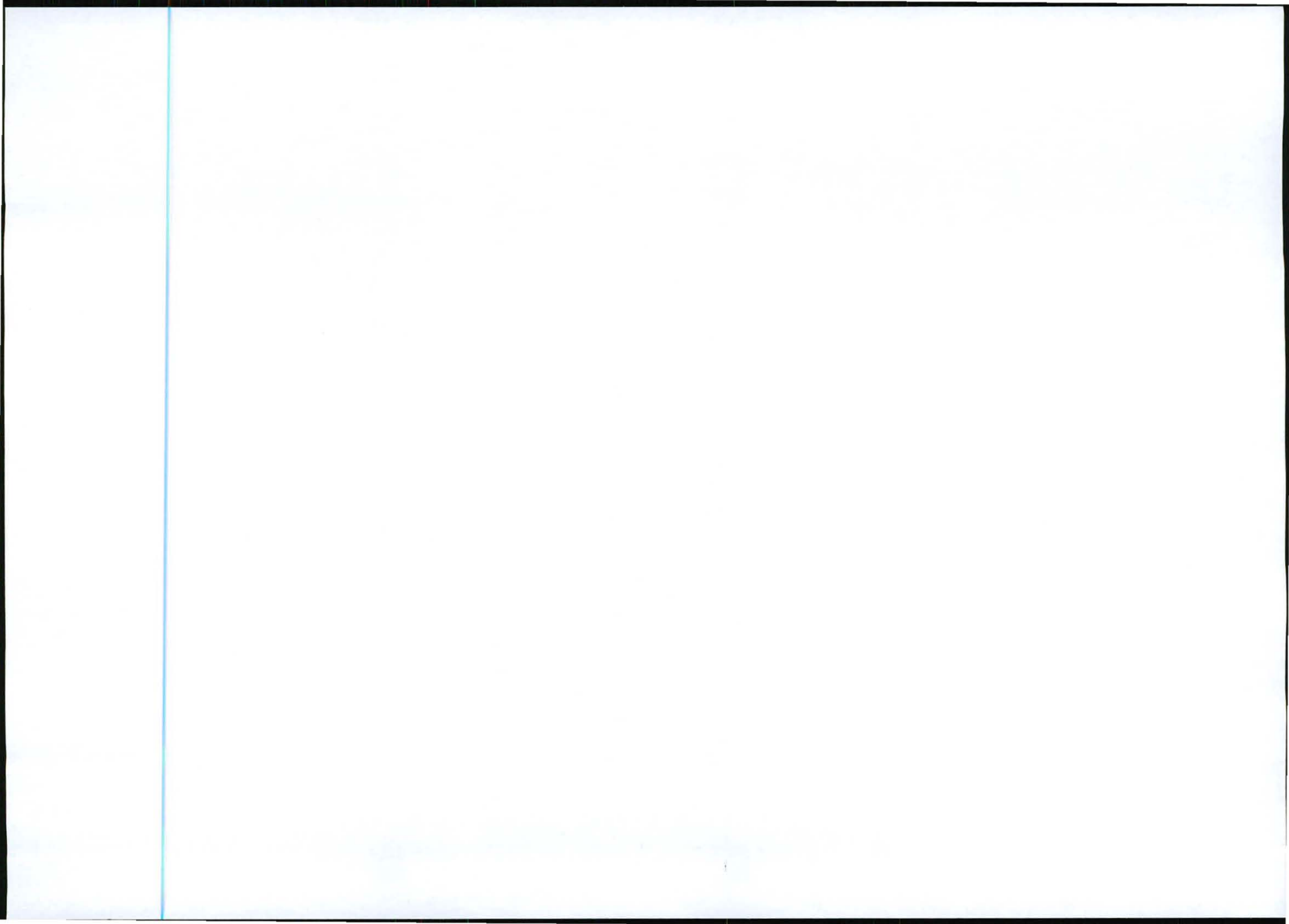
ANNEXURE E

FINANCIAL CALCULATION REHABILITATION

Item	Environmental Impact	Rehabilitation	Estimated Costs
Roads	None. Existing access roads will be used.	None	R0.00
Tailing Dams	None. Reprocessing is Rehabilitation.	None	R0.00
Infrastructure	Minimum. Temporary infrastructure will be established as this mining operation will only endure for 2 years.	Dismantle, demolish and remove	R20 000.00
Total Rehabilitation Costs			R20 000.00

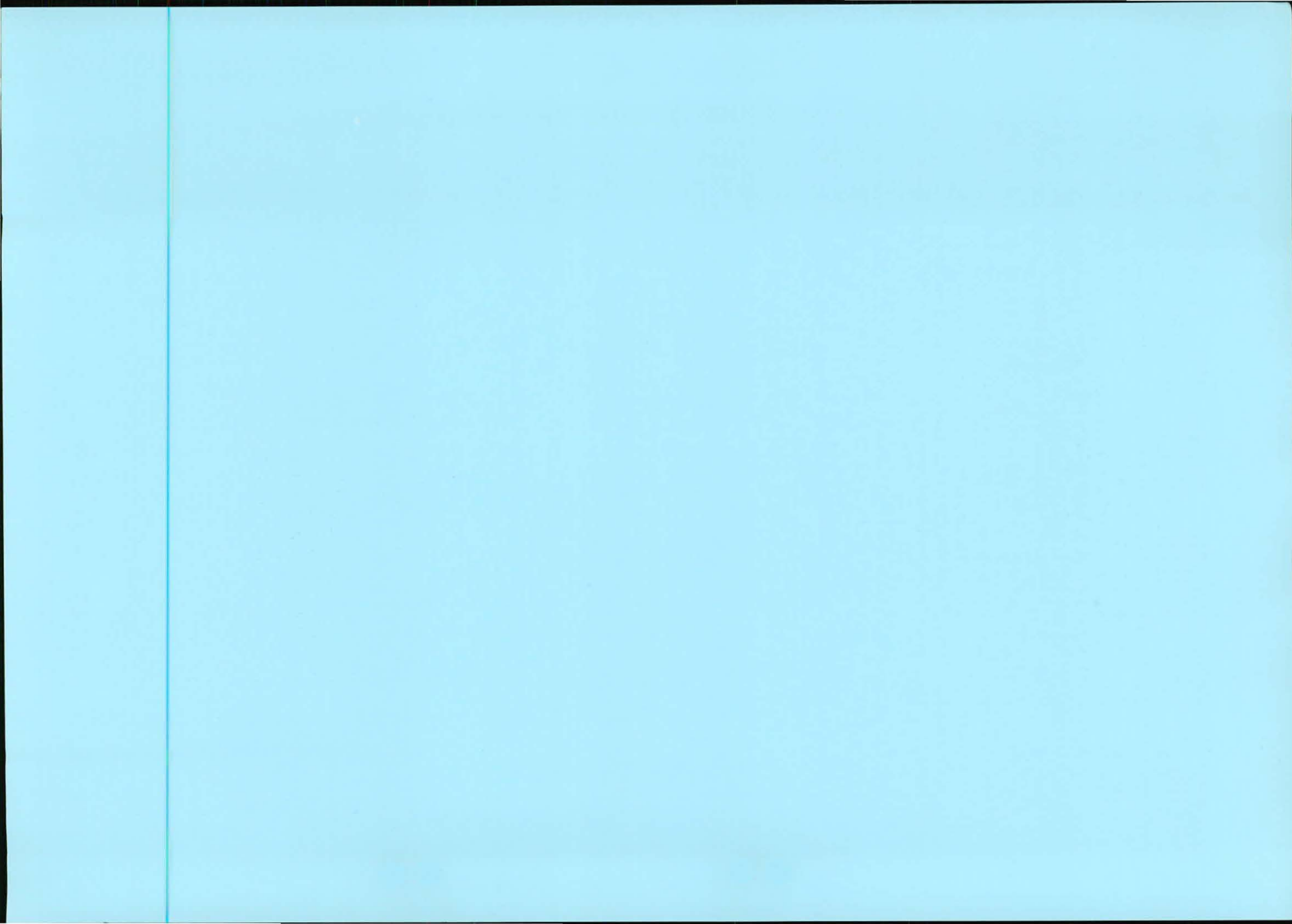
Contingency:

The Applicant is adamant to ensure that the Environment be rehabilitated and to prevent any Environmental impact that is unforeseen. For this reason the Applicant will allocate 5% of all profits to an Environmental Emergency Fund to be used for environmental emergencies and any rehabilitation over and above the above. The fund will only be awarded to shareholders as dividends upon successful closure and rehabilitation of the mine if and when the Department of Mineral Resources and the Applicant is satisfied that there will be no long term environmental management required.



ANNEXURE F

DETAILS OF MINERALS AND
REPROCESSING (MINING
OPERATION)



INTRODUCTION

In the view of the relatively small scale of this operation, the *heap leaching* method is envisaged to reclaim low grade gold (au) values treated from slimes and sand. Heap leaching is widely known and utilized to economically extract gold from both low and high grade ore. Heap leaching essentially entails the percolation of leach liquor through gold bearing ore, sand and slime, whereby the leach liquor dissolves and retains the gold contained in the ore, sand or slime. Gold is recovered from the leach solution in a cascade of up flow columns through activated carbon. Bullion is recovered from treated carbon.

The operation will provide start-up resources for a larger mining operation and in so doing, pave the way for future employment of a larger labour force on the mine. Furthermore, on completion of the operation, the dump will be newly re-established and ready for function in the hard-rock mining operation.

The area of operation consists of a residue dump (to be reclaimed) and a shallow, partly utilized dump (Reduction Plant Site). Opportunely, the dump's catchment area is much larger than the Reduction Plant Site area. By establishing the reduction plant on the surface of the shallow dump, the existing drainage system will contain any accidental spillage and entirely curb potential containment of the surrounding environment. The operation will have no negative impact on the environment or inhabitants.

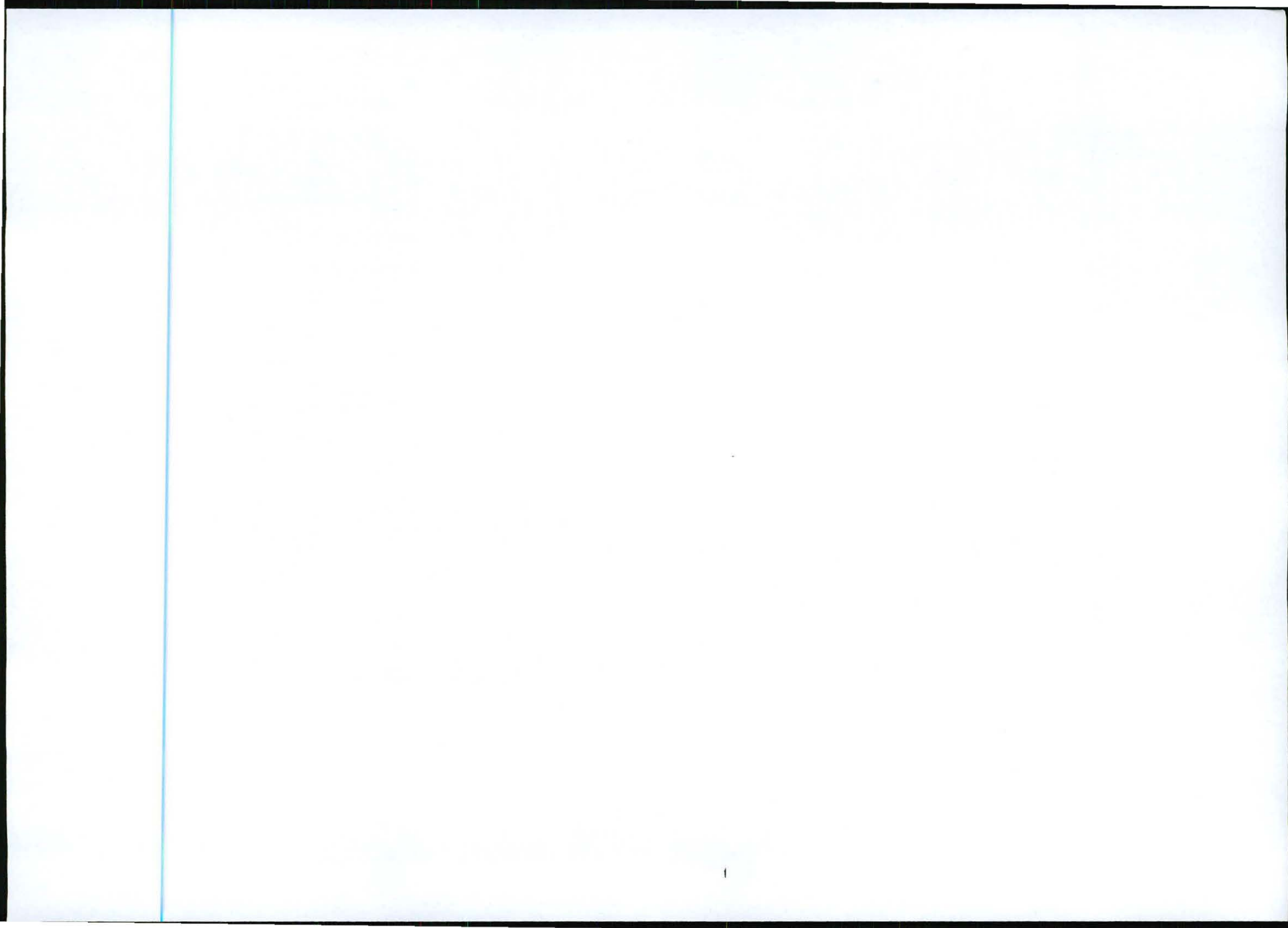
THE DUMP

No geological, mining or plant operating data is currently available from the time the mine was first opened (in the forty's) to its closure.

Unverified verbal reports provide the only data currently available as a basis for feasibility calculations. These are summarized below:

- Dump Size : 1.0 – 1.3 Mt
- Grades: 0.6 g/t and 0.7 to 0.8 g/t from a small number of samples taken more recently from the top of the dump.
- No data on leach tests are currently available and the % of refractory gold in the total gold assay is not known.
- The ore consisted mainly of banded iron stone indicating alluvial genesis. This could explain the presence of free gold but also justifies the possible presence of sulphides.
- The ore was milled and classified in hydro-cyclones. Free gold (accounting for 40% of the gold present in the ore) was recovered by means of shaking tables.
- Cyclone overflow was then treated in a CIP process and the residue formed the existing dump.
- The concentrations and nature of the sulphides are not known but the presence of Pyrrhotite has been reported. Other potential contaminants such as copper, arsenic, and graphite have not been mentioned.

The above problems, if they exist, can be identified quite easily and eliminated one by one by laboratory and full scale tests.



REDUCTION PLANT

The system entails:

- Six paddocks or leaching pads in a square layout. These are constructed of PVC sheeting sandwiched between re-enforced concrete slabs; each slightly sloped to the middle towards a central drainage sump. The paddocks are 10m x 20m x 200mm in size.
- Two 5000 liter reservoirs for weak solution and strong solution tanks. These are elevated on a steel frame construction with a pinned concrete base.
- Two 2000 liter reservoirs, as clarifying tanks.
- Sixteen 300 liter leaching vessels constructed in a square layout, cascade setting, interconnected in an upflow arrangement. These vessels accommodate the activated carbon for gold absorption.
- Two *Warman* slurry pumps, 76.2mm (3"); two *Warman* slurry pumps, 101.6mm (4"), one *Sala* spillage pump.
- MUL-TO-TEC Classifying Cyclone, 600mm Ø.
- Interconnecting HDPE pipes of various diameters with manual- and non-return valves and misting sprayers. Serviceable bolt-on flange connectors are used to allow easy dismantling during routine servicing or blockages.
- Compressor delivering 4-6 bar air continuously through a 10mm nozzle.

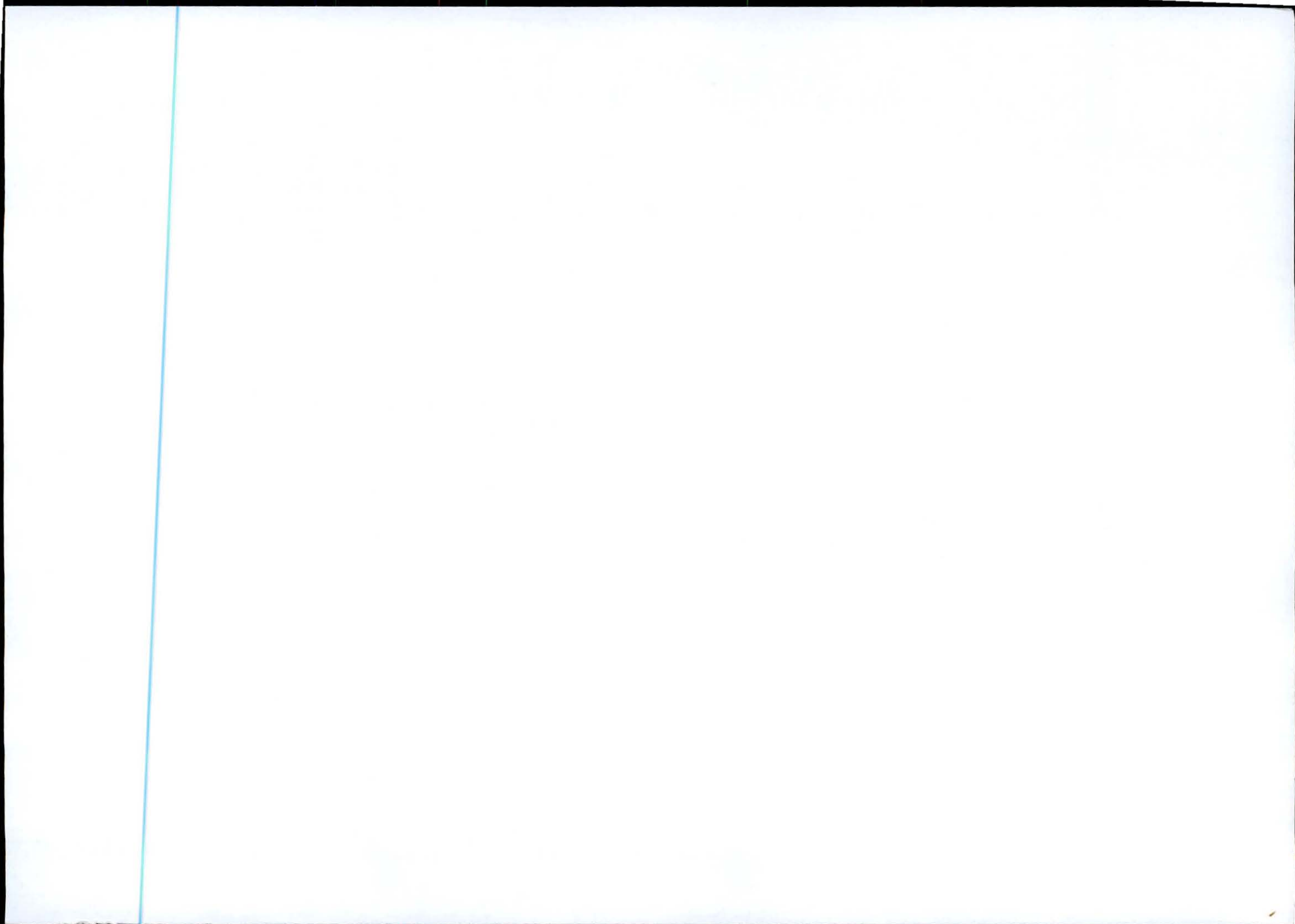
REDUCTION PROCESS

Leaching process

A front-end loader is used to mechanically excavate dump material (sand) from the dump to a stockpile near the leaching pads. Roughly five percent lime is added to the sand on the stockpile. From the stockpile, the sand is stacked in a layer 750mm thick on each of the four leach pads. The pads are now charged and ready for leaching. A sample for assay is taken from each pad prior to leaching.

Water containing a strong cyanide (KCN) solution (0.3%) is pumped from the strong solution reservoir on the leach pads. The mist from the sprayers covers the charge on the leach pads, permeating through the sand whereby gold residues are dissolved and contained in solution. Said solution gravitates from the leach pads to a drain and slump, from where it is pumped to a clarifying reservoir to settle out any fines carried over from the charge on the leach pad (assayed). A medium solution KCN is then permeated through the charge on the leach pads and into a clarifying reservoir (assayed). Typical quantities of solution used per ton of ore are: strong solution 0.25 ton; medium solution 1.0 ton; water washed 0.5-0.75 ton. Leaching time is 12 hours per batch. Both strong- and weak KCN reservoirs are aerated by compressed air to enhance the oxygen content of the solution, which is vital to dissolve the au in the charge.

The au-pregnant solution from both clarifying reservoirs is then cascaded through the leach vessels containing activated carbon and returned to both the strong and weak KCN solution reservoirs, where the KCN concentration is readjusted and reapplied to the next batch of sand to be leached. The carbon in the leach vessels strips and retains the gold from the solution. Revenue is gained by selling the loaded carbon to a facility for that purpose in Gauteng. (Figure 1, Flow Sheet)



Process Tailing

Barren sand from the leach pads is hydraulically transferred to a concrete sump from where a Warman slurry pump transfers the sand to a paddock on an existing shallow dump. The sand is partly dewatered by means of a cyclone before distribution on the dump. Excess water is transferred to the evaporation dam and pumped back to the return water dam for treatment and re-use.

The dump earmarked for this operation is adequately constructed and encompass:

- Containment- or toe wall – a wall of compacted earth to contain the tailings
- Underdrainage system – filter drains containing seepage within the dump
- Decant system – a pipe system to facilitate the removal of clarified water and stormwater accumulated on the impoundment.
- Stormwater diversion system – a system of trenches, and bunds constructed around the impoundment to control and divert external stormwater around the dump.
- Catchment paddocks – a system of paddocks constructed around the toe of the dump to capture. Control and store stormwater and sediment eroded from the slopes of the dump.
- Ancillary berms and catchment dams – additional safety measures.

Dispositional Area Requirements

Indicator Table

Dry tons per month leached	Pulp: Settled Density (Dry)	Total Tons
67500 tpm	1450kg/m ³	970 000 tons

At this stage the dump is five meters high. A maximum height of 35-40m would be assumed for this operation.

Typically, gold tailings have a settled density between 1250kg/m³ and 1650kg/m³, depending on the depth of the dump and the position of the section within the dump. A reasonable figure to assume for sizing calculations is this 1450 kg/m³.

The required tailings dam area can then be calculated very simply from the equation:

$$\text{Area, m}^3 = (\text{tpm} \times 12) / (1,45 \times \text{ROR})$$

- tpm: dry tons per month
- ROR: Allowable rate of rise

Thus: Area, m³ = (67500tpm x 12) / (1,45 x 2,5m/yr) for this operation

The area of the dump is therefore sufficient to contain the tailings with ease. (See detailed dump sketch plan for this information)

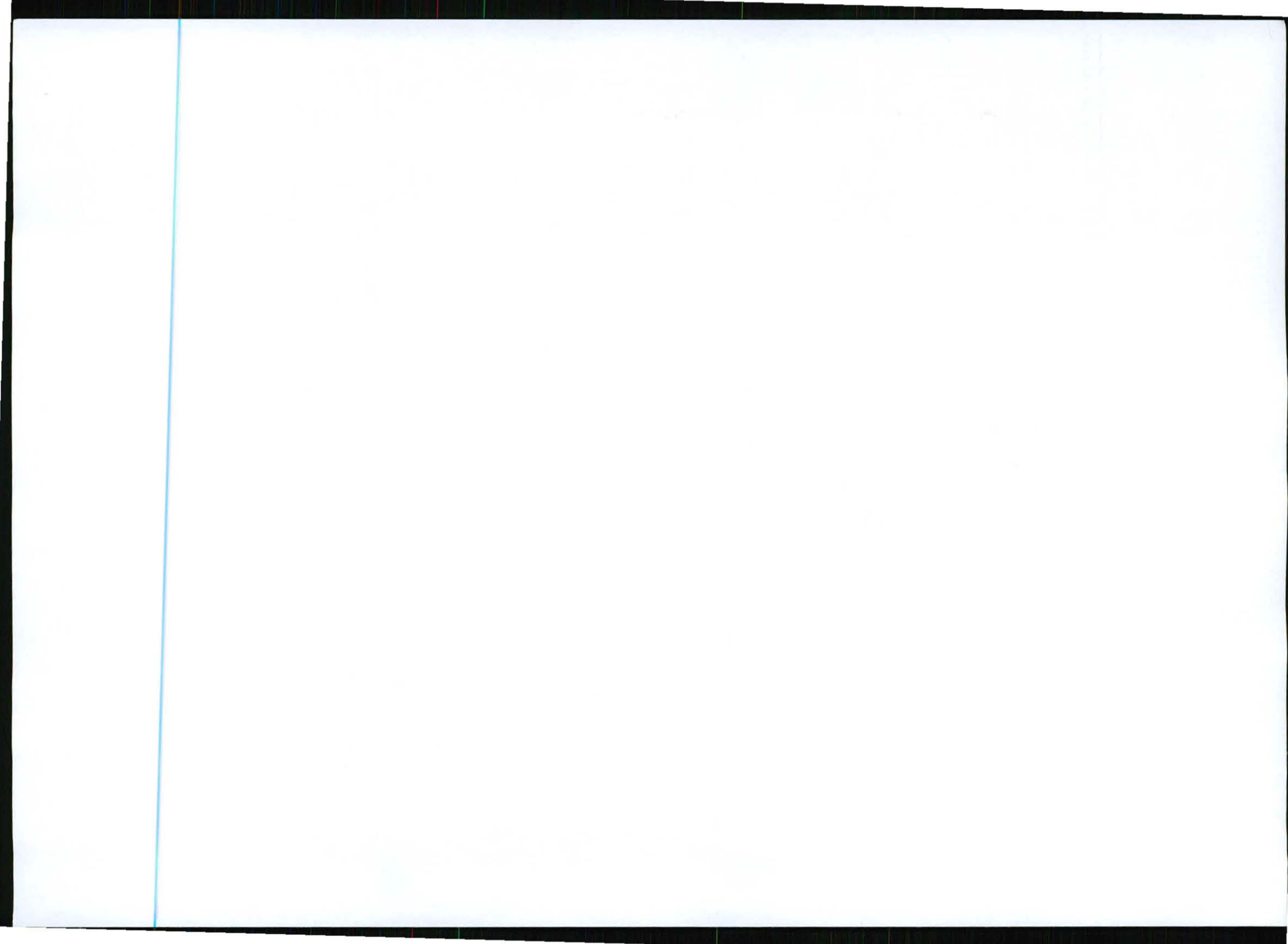
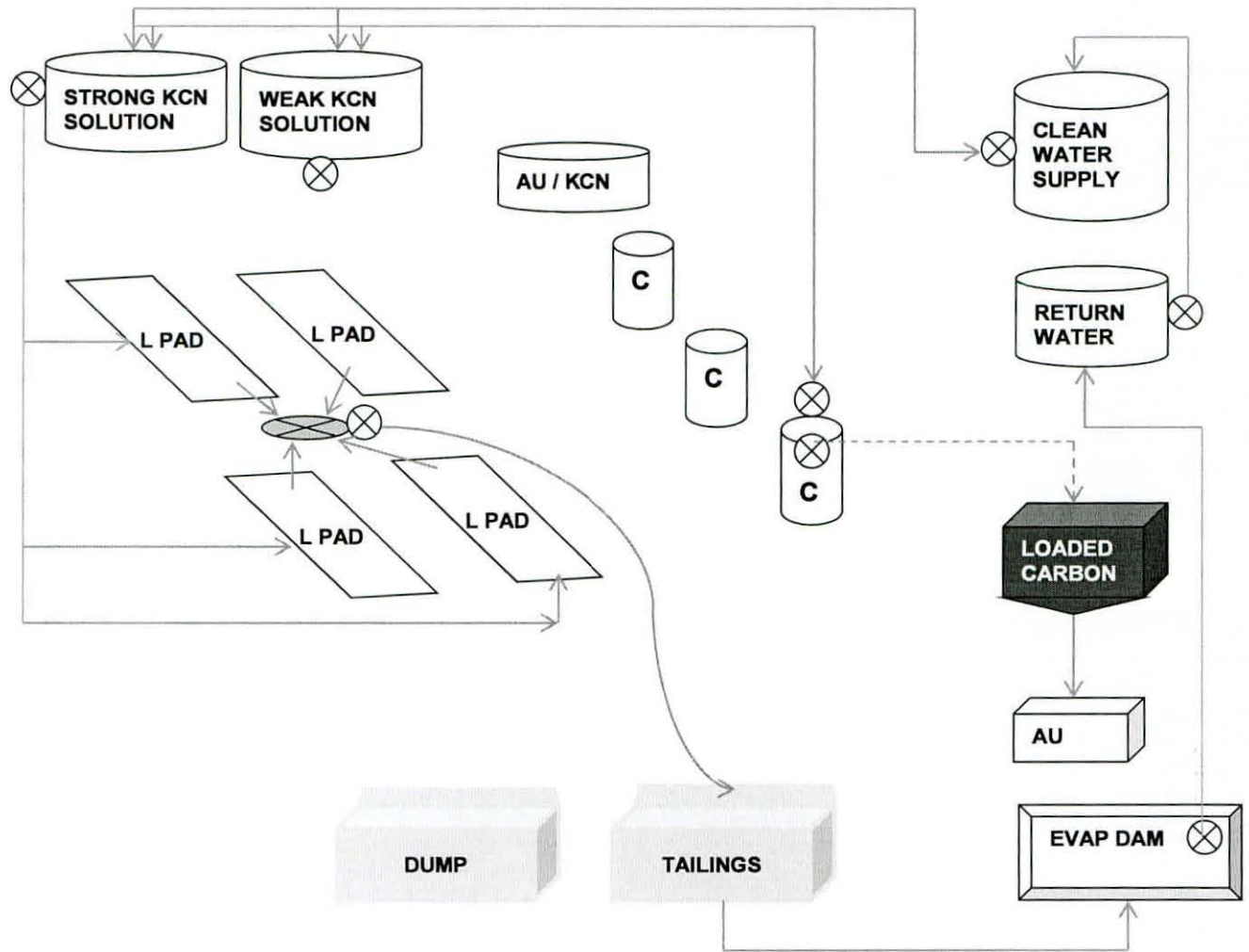


Figure 1: Simplified Leaching Plant Flow Sheet



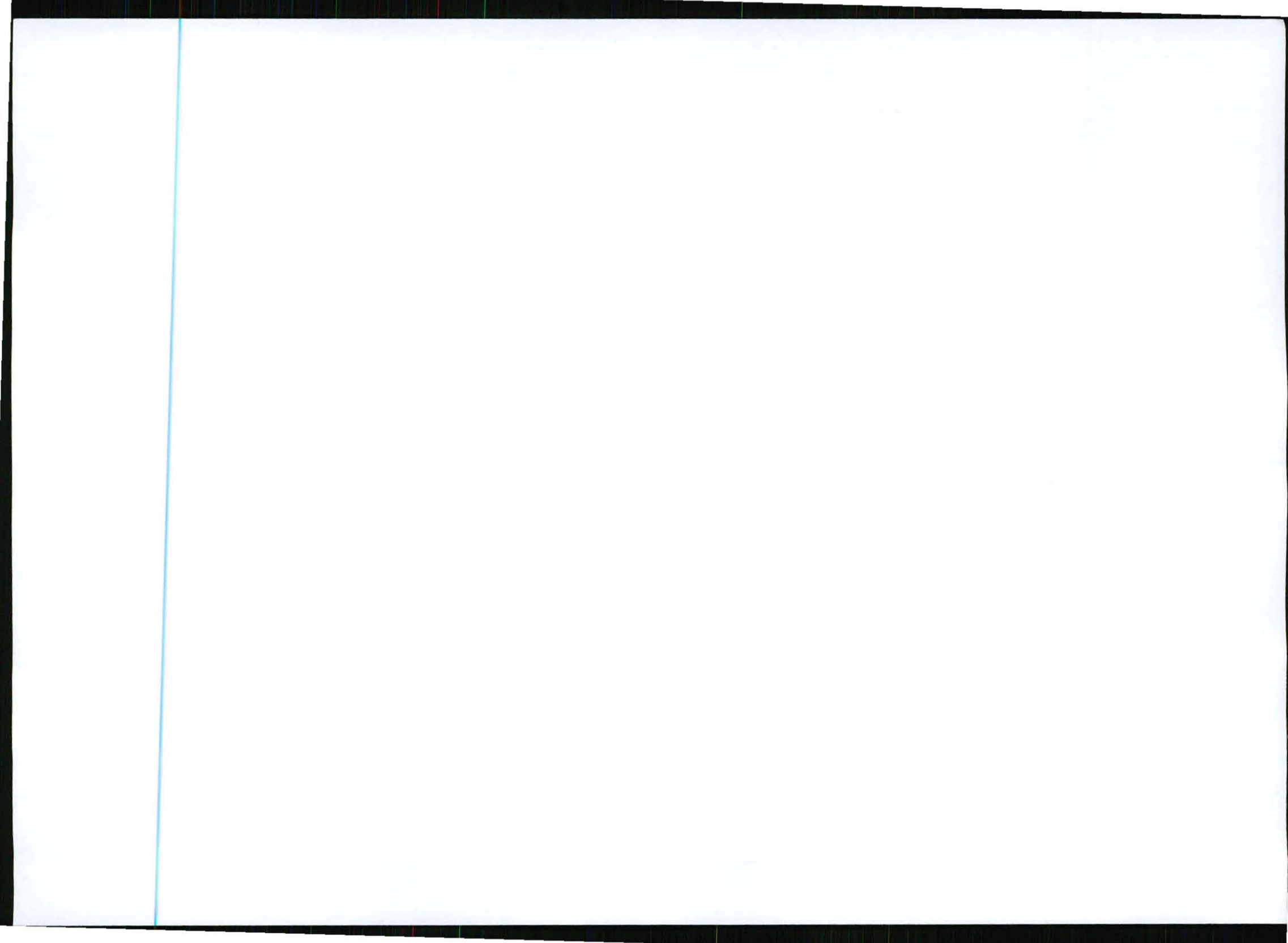
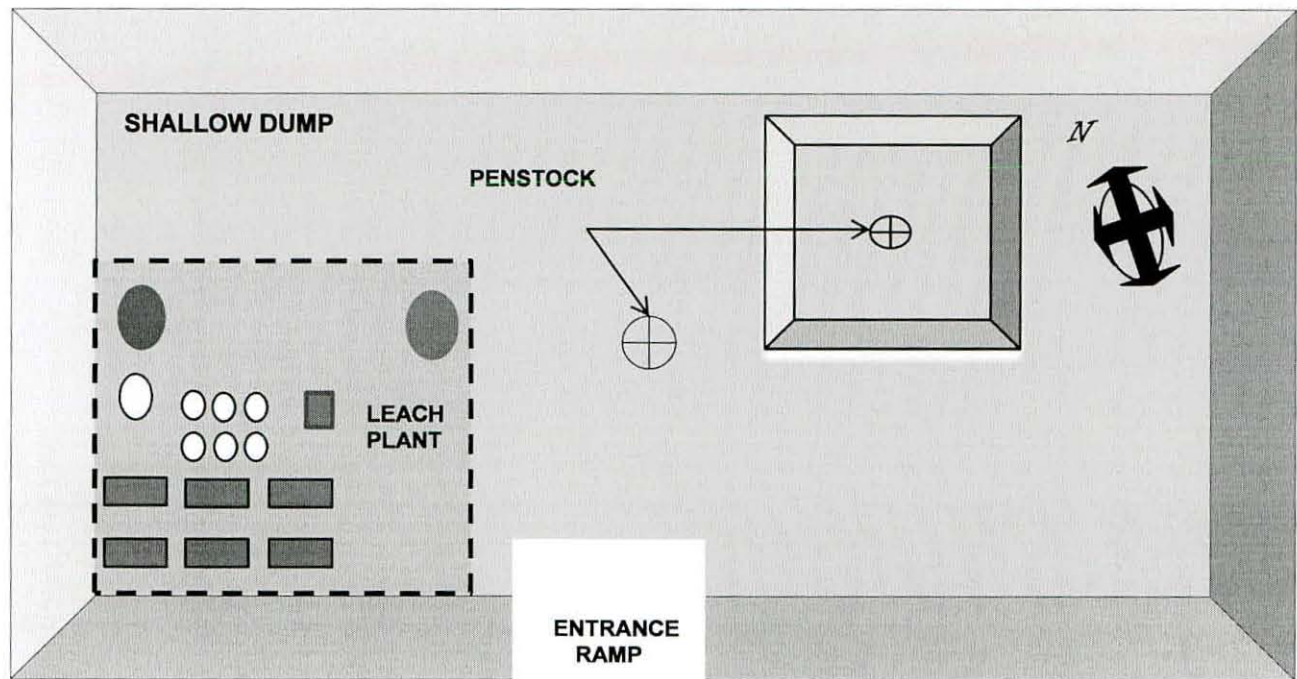
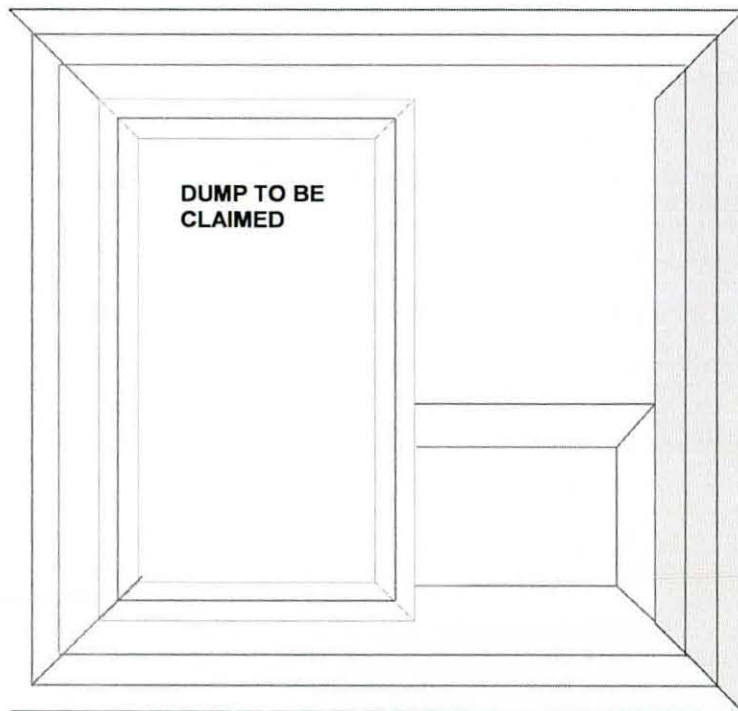
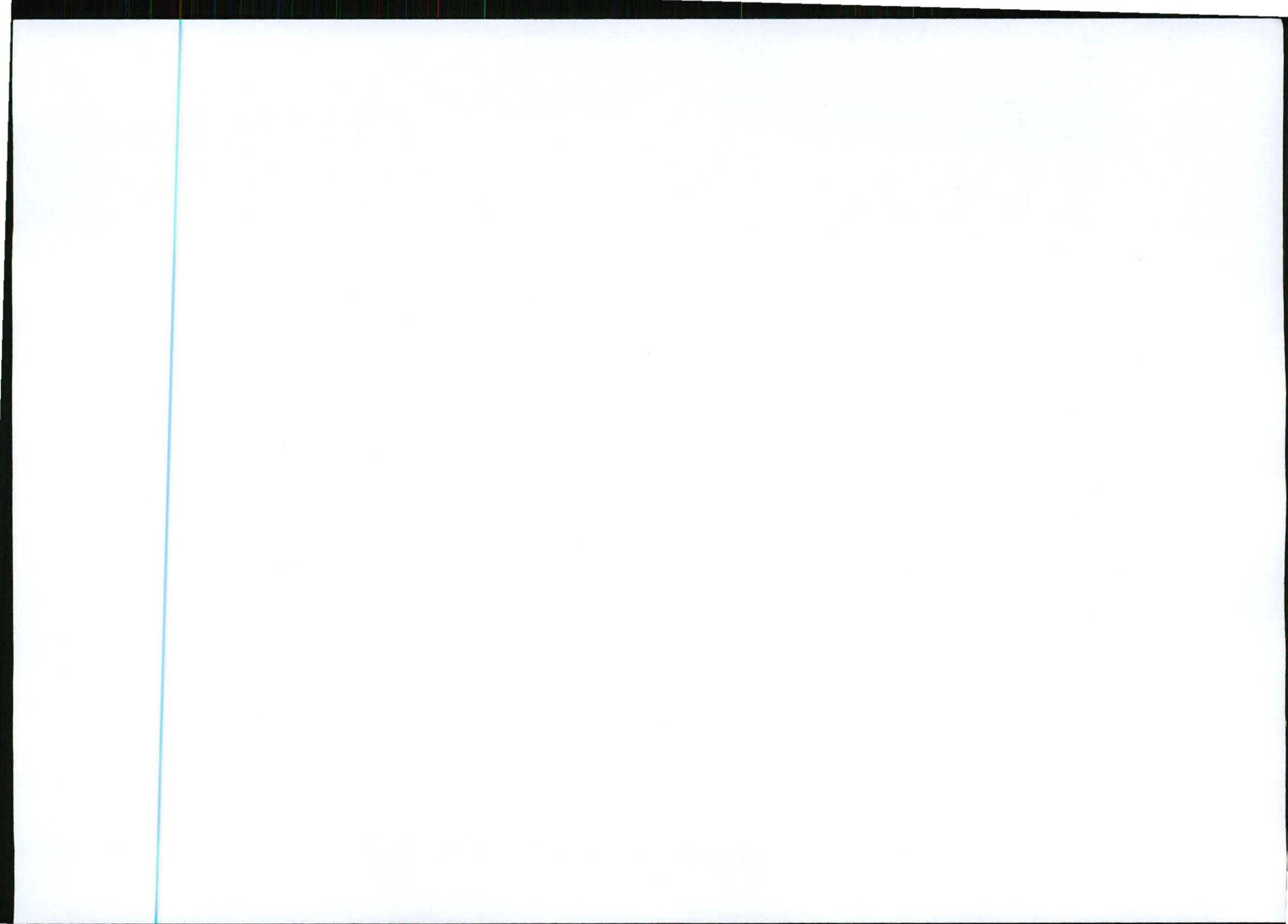


Figure 2: Location of the Leaching Plant in relation to the dumps.



ACCESS ROAD ← →





1. COMMISSIONING

1.1 Site Preparation

The site where the reduction plant is erected was already leveled by the former mining company. The site is to be "mud & dust proofed" by covering the surface area with granite gravel.

Existing buildings on the mine will be utilized for offices, admin and a laboratory.

Existing access roads are used and maintained.

The existing electrical grid on the mine will be utilized.

The existing water circuit will be used.

1.2 Plant Construction:

There are certain basic principles considered in striving for a good plant layout.

- Clear and logical layout for ease of control, aesthetic appeal and more pleasant working environment.
- Hauling & traveling requirements are minimized.
- Ease of operation, supervision and maintenance.
- Safety and security is maximized.
- Adequate provision for plant expansion.
- Locality planning for possible natural disaster i.e. floods, fire and landslides.

Construction is executed by the applicant. The operation is a short-term, temporary component system, therefore very little masonry is necessary for the construction of the plant.

The electrical circuit on the plant is installed by a qualified artisan.

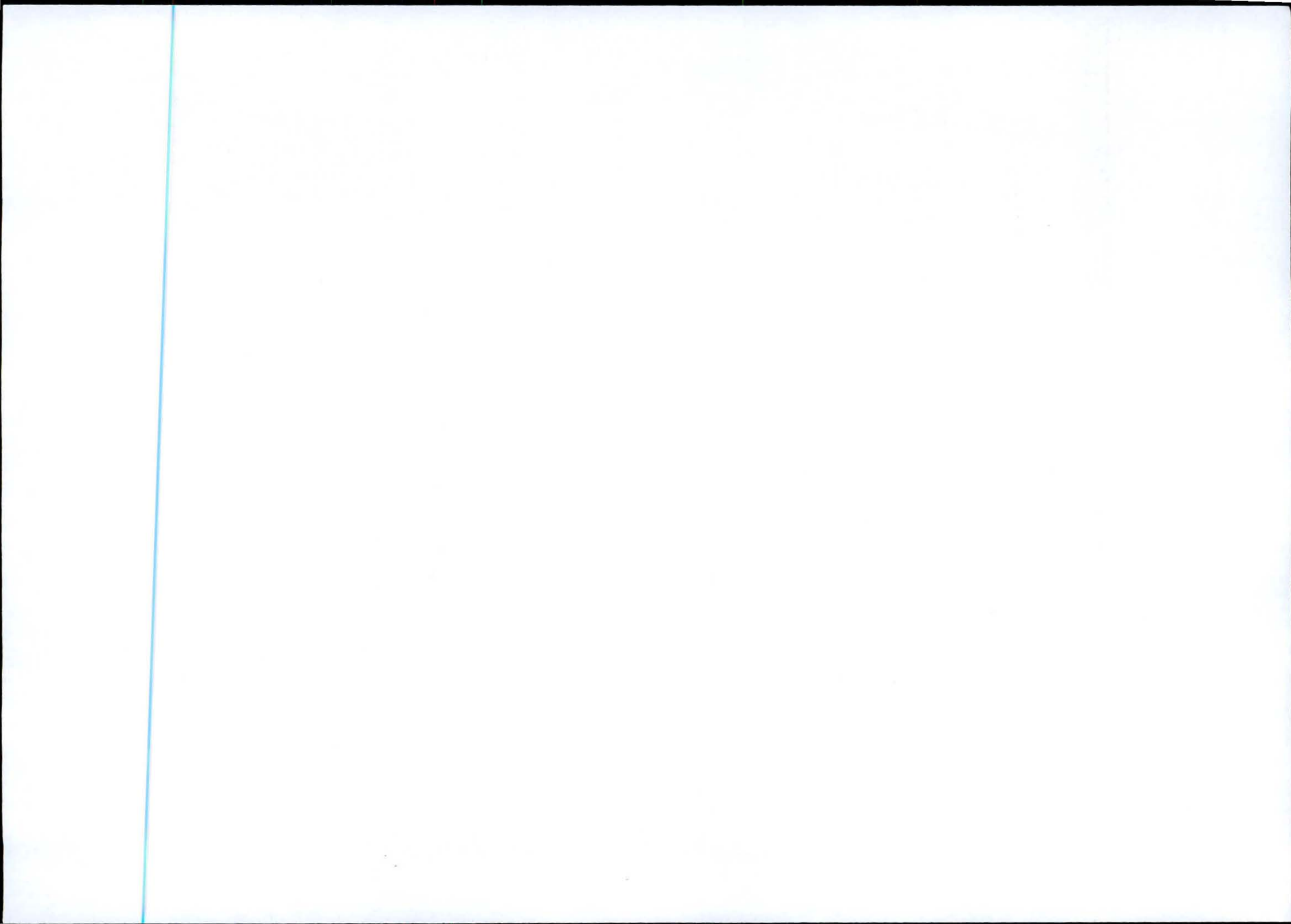
The construction is done within the perimeters of the current Regulations as stipulated in the Act and guidelines suggested by the DME.

1.3 Cold Commissioning

Following construction, the plant is run without addition of either chemicals or feed. All leakages and other problems are rectified during this test. The plant is then fine-tuned in preparation for production.

1.4 Hot Commissioning

After all obvious problems and faults are eliminated: process material is fed into the system. Feed rates are kept low initially and gradually increased until full production figures are reached.



2. PRODUCTION

2.1 & 2.2 Production rate and Duration of Operation

Baseline

Tons per day	Tons per month	Ton available	Duration of Operation
2250 tons	67500 tons	940 000 tons	14 Months

The above reflects calculated figures and does not allow for breakdowns or any other impediments.

Total time of operation:

Construction	Production	Decommissioning	Total
3 Months	14 Months	3 Months	20 Months

Allowing an additional two months leeway for the sake of the unforeseen, the anticipated operation period is 22 Months.

Process water for the operation is drawn from a borehole on the premises. Additional reserves are contained by flooded old workings on the mine. A return-water system is also in place to recycle a percentage of run-off water accumulating in the evaporating dam.

Labour, both skilled and unskilled, is recruited from the surrounding area.

3. DECOMMISSIONING

3.1 Rehabilitation

The leaching plant is dismantled and the area leveled. In view of the pending hard-rock mining operation, the area will be covered with slimes in the forthcoming period. This operation is described in the EMP for this operation.

3.2 Dump Maintenance

The dump will be maintained as required in the Act and as pledged in the EMP for this operation.

3.3 Long Term Objective

The dump will be utilized for a pending hard-rock mining operation on the same property. All future responsibilities are accepted by the said operation, of which the expected duration is 15 years.



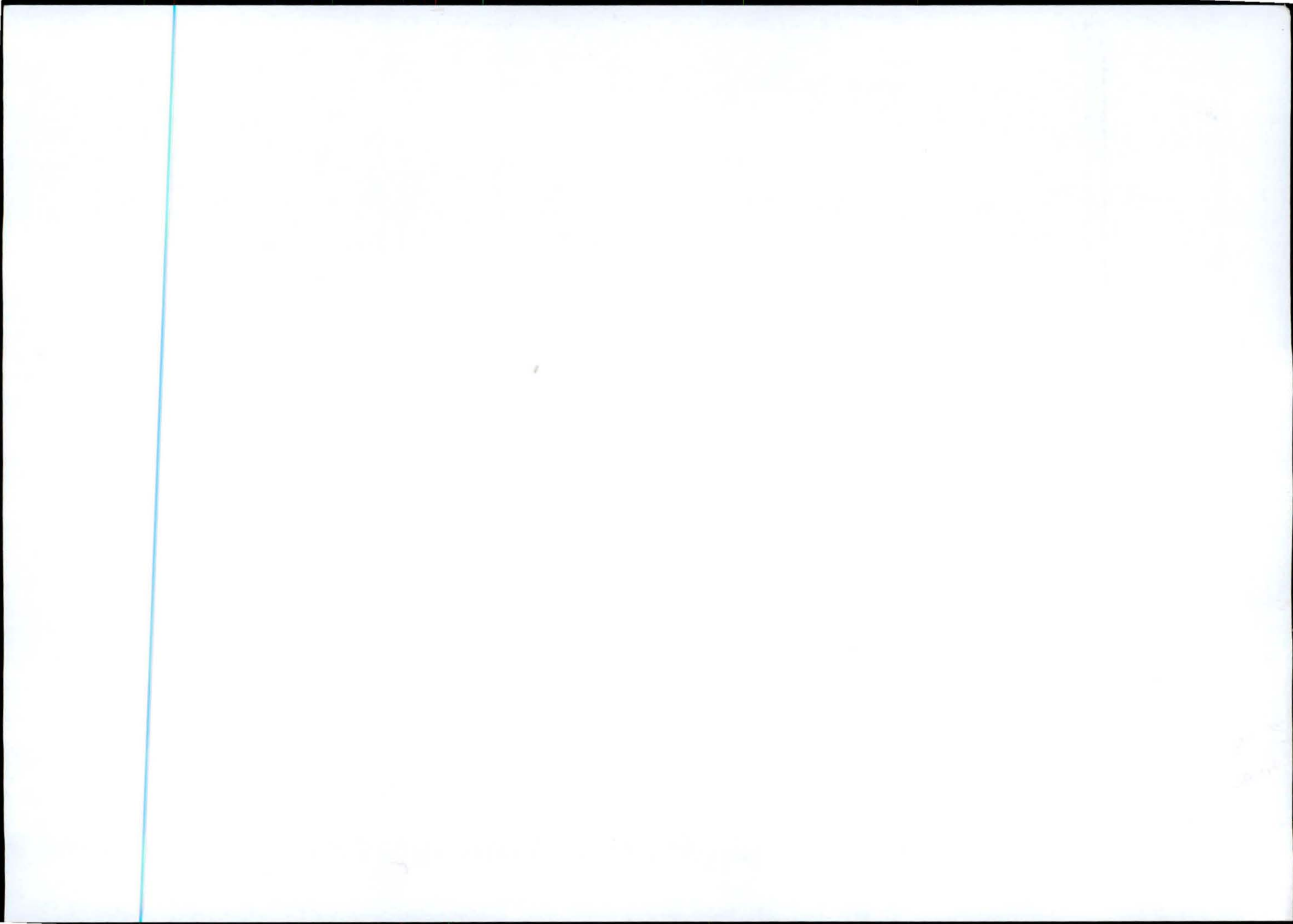
ASSAY RESULTS TZANEEN/OSPREY DUMP

SAMPLE	Au	LOCATION	DEPTH	7.05 0.5426308	t
OS1	0.40	perimeter -5m	0.2 - 1.0	0.8	0.04539
OS2	0.39	perimeter -5m	0.35 - 0.7	0.35	0.019362
OS3	0.27	top	0.7 - 1.0	0.3	0.011489
OS4	0.30	top	0.4 - 0.9	0.5	0.021277
OS5	0.47	top	0.3 - 0.6	0.6	0.04
OS5	0.40	top	0.0 - 0.6	0.6	0.034043
OS7	0.43	top	0.1 - 0.6	0.5	0.030496
OS8	0.39	terrace -3m	0.4 - 0.8	0.4	0.022128
OS9	0.35	top	0.3 - 0.9	0.6	0.029787
OS10	0.37	top	0 - 0.5	0.5	0.026241
OS11	0.79	terrace -8m	0.5 - 1.0	0.8	0.089645
OS12	0.30	terrace -11m	0.3 - 0.8	0.5	0.021277
OS13	0.51	terrace -13m	0.3 - 0.9	0.6	0.043402
OS14	0.95	Erosion Channel			
OS15	0.78	Erosion Channel			
OS16	0.79	Erosion Channel			
OS17	1.19	Erosion Channel			
OS18	0.71	Erosion Channel			
OS19	0.83	general composite			
OS20	0.99	Erosion Channel composite			

COMMENTS: Typically the pit samples 1 to 13 were at max depth 1m and representative about 500mm with a bias toward the dump top (Dump material was too compacted for hand augur to penetrate) The Erosion channels could be sampled across their length, three meters or greater and offer a more realistic assessment of potential deeper level tailings grades.

More data is required – i.e. deep sample boreholes, to make accurate predictions of the final grades.

A summary appraisal of the data suggests grade potential 0.8 to 0.9 Au grammes per tonne on available data. The assertion by J J van Aarde that a mean grade better than 1.2 g/t, based on more extensive work carried out under his supervision, certainly has merit, and cannot be discounted by the limited result thus far from our initial investigation.

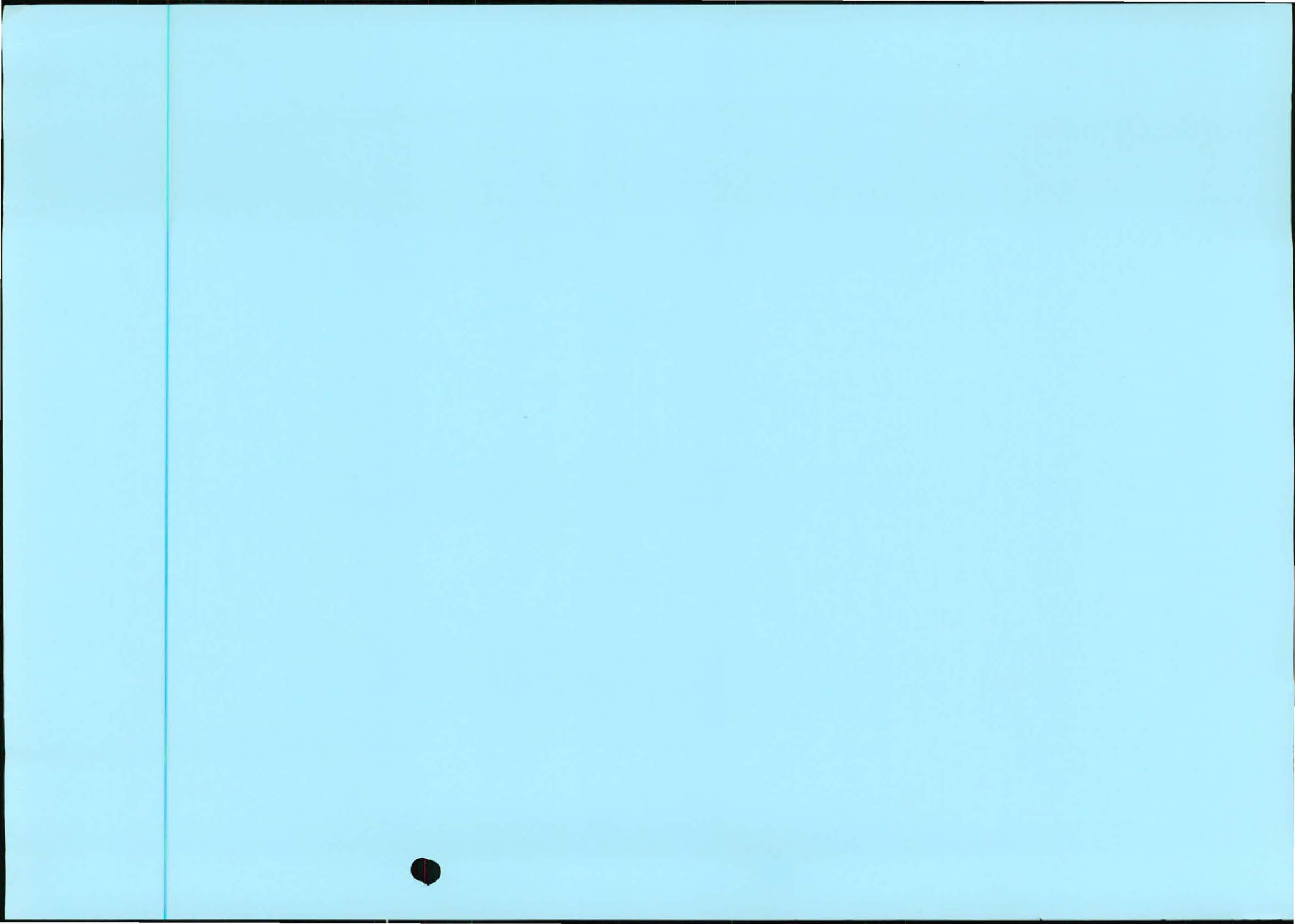


ANNEXURE G

ALTERNATIVE
ANALYSIS

LAND

USE



ANALYSIS OF ALTERNATIVE LAND USE

A) Details of Property

PROPERTY DESCRIPTION

The Farm KIRSTEN 212

Registration Division J.U.

Mpumalanga Province

Measuring : 1812,9242 (One thousand eight hundred and twelve comma nine two four two) hectares

Held by Title Deed T16046/1989

LANDOWNER

Government of the Republic of South Africa

BENEFICIAL LAND USER

Madonsi Local Community administered by the Madonsi Tribal Authority

B) LAND USE

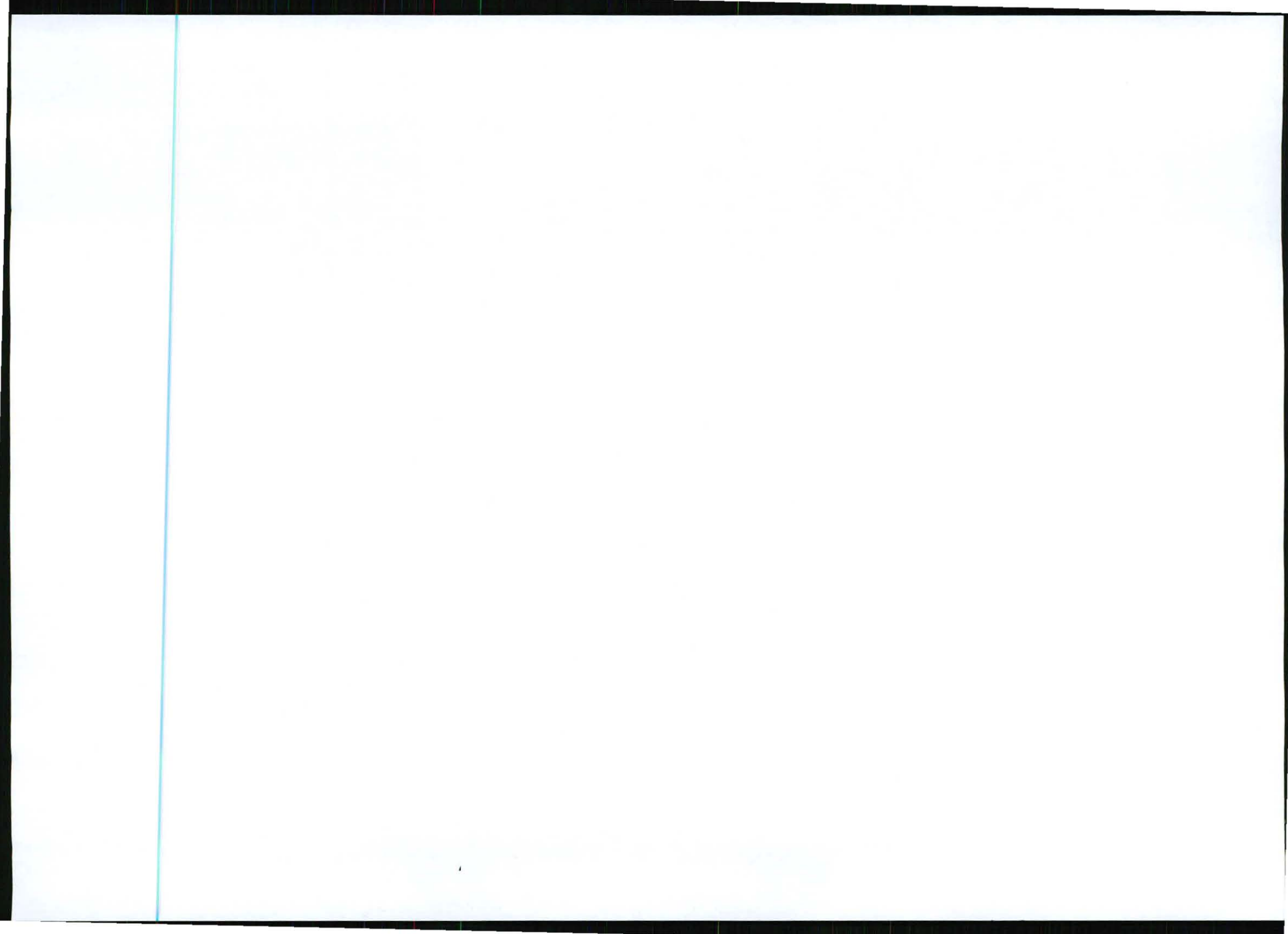
HISTORICAL LAND USE:

The property was transferred to the Government of the Republic of South Africa in 1989, before which the property was commercially farmed. No infrastructure is left and no commercial crops have remained. The previously agricultural land has degraded to grazing land.

The property was historically mined, previously known as the Osprey Mine. This man has been deserted for many years. The infrastructure and residue of previous mining operations have left the area over for which the mining permit was applied for is covered with old tailing dams. The tailings dams has left that total area unusable for any alternative use.

CURRENT LAND USE:

The area over which the mining permit is being applied is unusable as it is covered by the old tailings dam. The area is unusable.



The adjacent are is used for grazing land for cattle of the local community. There are no commercial agricultural or other commercial activities on the adjacent areas.

POTENTIAL LAND USE:

The area over which the mining permit is applied for is unusable as the tailing dams are physical obstructions for alternate use. Any alternate use shall first require that the area be rehabilitated, incurring extra costs and will be a wasteful use of commodities. This will not be cost or time effective.

In order to potentially use the area for alternative use, the area must be rehabilitated. The cost and time effective way is the reprocessing of the old tailing dams. The main reason for the non-rehabilitation of the tailing dams is the lack of experience and expertise in this field. The only constructive solution is for the Applicant to reprocess the tailings dam to ensure that the Local Community will have use of the area.

There are no alternative land use that will not have any adverse impact on the adjacent properties.

C) FEASIBILITY OF VARIOUS LAND USES

The land is currently unusable. The rehabilitation of the area will ensure that the physical obstacle in the development of the land be removed and the area can be developed to its full potential. The reprocessing includes the rehabilitation of the area, which will save such costs for the local community in their future development plans.

The mining operation will only be for a period of 2 years. This is a cost and time effective solution for the current situation.

The adjacent area is currently not used for any economic activity and only small scale informal grazing. The larger farm area will still be available for grazing. The whole of the mining operation will only utilize 1.5 hectares of the 1812,9242 hectares of the farm.

If the mining operation is not approved the local community will still be left with a horrid eyesore which is not movable, removable or usable to them. The costs of the rehabilitation will be borne by the Applicant and the Local Community will have beneficial use of the area

