

Geological Report: Strichen-Crimond AE28

28 JUN 1973

5, Princes Gate, London, SW7 1NN

During the period 9th August - 31st December 1971, the exploration programme on this project involved geological, geochemical and geophysical surveys.

(i) Geology

Reconnaissance mapping was undertaken in the northern part of the area to check outcrop type and determine the nature of basic and mineralised float patterns.

(ii) Geochemistry

A geochemical soil survey was carried out over an isolated magnetic anomaly near Rathen. A weak molybdenum pattern probably related to traces of metal in bedrock was detected.

(iii) Geophysics

a) Induced Polarisation

Reconnaissance three electrode array surveys were carried out over basic rocks south-east of Strichen and near Rathen. Only one anomaly at Skillymarno was investigated by a follow-up survey and was found to be related to a man-made conductor.

b) Magnetics

A detailed vertical force magnetic field survey was undertaken at Rathen to delimit an anomaly thought to be related to basic type rocks, which was eventually assessed by IP.

Enclosures

NK06SW (E & W Halves) + text

NK05NE (N & S ") " "

- ✓ 1. Geological field sheets.
- ✓ 2. Geochemical soil results at Rathen. (Cu, Cr, Mo & Ni)
- ✓ 3. Induced polarisation survey results in the Strichen area.
- ✓ 4. Induced polarisation survey results at Rathen.
- ✓ 5. Vertical force magnetic field results at Rathen. (chart only)

* Craiggillie, recce. - Rathen area.

* Skillymarno, follow-up

* & Forest of Deer, recce.

FINANCIAL ASSISTANCE FOR MINERAL EXPLORATION (M.E.I.G.A.)

COMPANY: EXPLORATION VENTURES LTD

REF: AE 28

MRD 84/5/21

PROJECT: STRICHEN CRIMOND

MRD 144/5/21

The following Open File material is held by B.G.S. in London, Keyworth and Edinburgh. Available for public inspection from 16.10.80.

- Extract from draft application 6.8.71 "Outline of proposed projects including geological considerations". With accompanying plan O.S. Sheet 5, 1":4 miles.

Geological report 9 Aug to 31 Dec 1972 with the following enclosures:

- (i) Location map 1":4 miles
- (ii) Geological field sheet with accompanying text.
O.S. 6" Sheet NK 06 SW West and East halves. Aug '71
- (iii) Geological field sheet with accompanying text.
O.S. 6" Sheet NK 05. North and West halves Aug '71
- (iv) Soil results for Rathen. 4 sheets: Mo, Cr, Ni, Cu
- (v) IP Chargeability and resistivity results Oct '71.
Sheet NJ 95 SE & SW
- (vi) Chargeability results - Craigellie. Dec '71. Sheets
NK 05 NW and NK 06 SW
- (vii) Resistivity Results - Skillymarnd. Dec '71. Sheet
NJ 95 SE.
- (viii) Vertical Force magnetic field results. Rathen sheets
NK 05 NW and NK 06 SW.

1972 Activity Report, including the following soil results for Rathen:

Fig 1 - Mo
Fig 2 - Cu
Fig 3 - Cr

- *# Report on Exploration for Molybdenum in East Aberdeenshire.
March '73
- *# Map of molybdenum anomalies > 10 ppm

* Not in Keyworth # Not in London

MINERAL EXPLORATION INCENTIVE SCHEME

APPLICATION

for assistance

1. Applicant Exploration Ventures Limited
Address 49 Moorgate, London EC2R 6BQ
Telephone No. 01-606-1020
Contact Mr. R.B. Riley or Mr. M.J. Lynch

2. Project title Stricken-Crimond

3. Applicants' organisation & financial structure

Please see this Company's letter dated 6th August, 1971.

4. Outline of proposed project, including geological considerations

A little known geological area over which stream and soil reconnaissance with some mapping shows it to be predominantly of Dalradian metamorphics with a number of scattered drift covered 'magnetic bodies', presumed to be minor basic intrusions. The area has extensive drift coverage. The minerals sought in this area are Ni, Cu sulphides and any associated minerals.

5. Work programme and cost of project

It is intended to continue the programme in this area with geophysical induced polarisation and magnetic surveys over selected targets for about one month followed by a geological mapping programme lasting about one and a half months.

Application for contributions under the Mineral
Exploration and Investment Grants Act 1972.

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NK06SW (E & W Haloes) + text

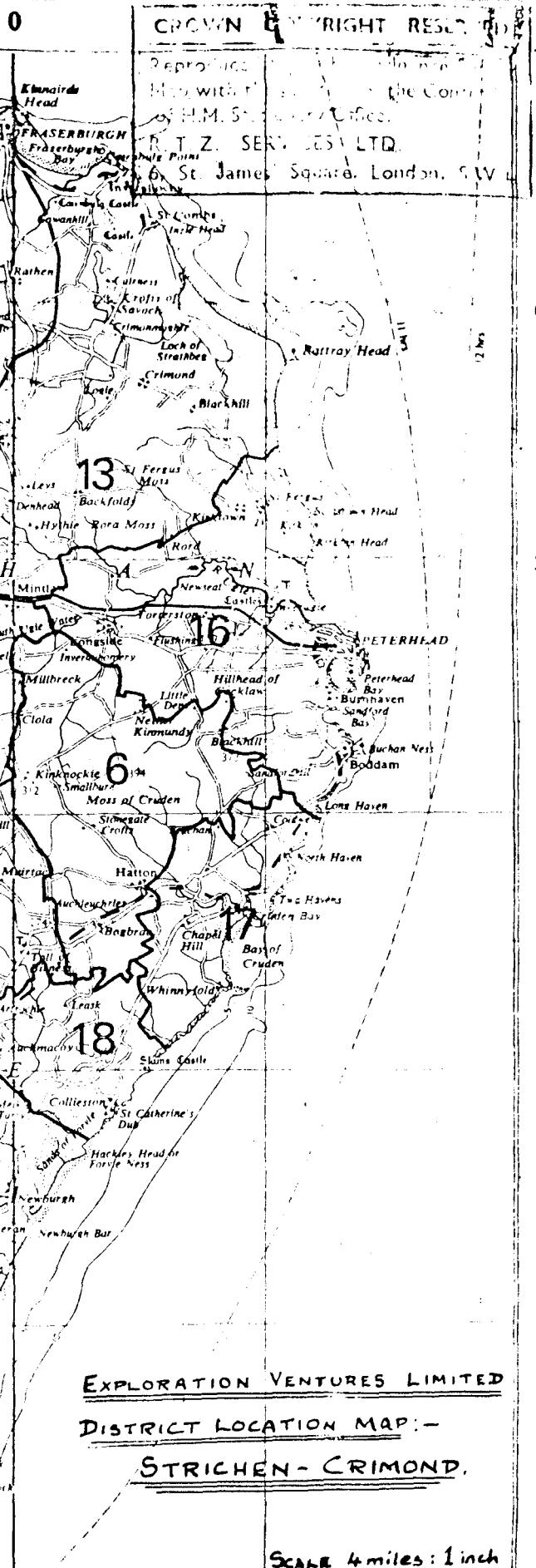
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Skillymarno, follow-up
& Forest of Deer, recce.

- ADMINISTRATIVE AREAS IN RIOFINEXS SECTOR

- | | |
|-----------------------|-------------------------|
| 1 Arthrath - Hurlwick | 10 Udny |
| 2 Kinharachin | 11 Quilquoxt |
| 3 Balquhidderchie | 12 West Haddo |
| 4 Belhelvie | 13 Strichen - Crimond |
| 5 Crichie | 14 Newburgh |
| 6 Forest of Deer | 15 Inverurie - Straloch |
| 7 Haddo | 16 Longside - Peterhead |
| 8 Maud | 17 Cruden |
| 9 Oldmeldrum | 18 Slains |

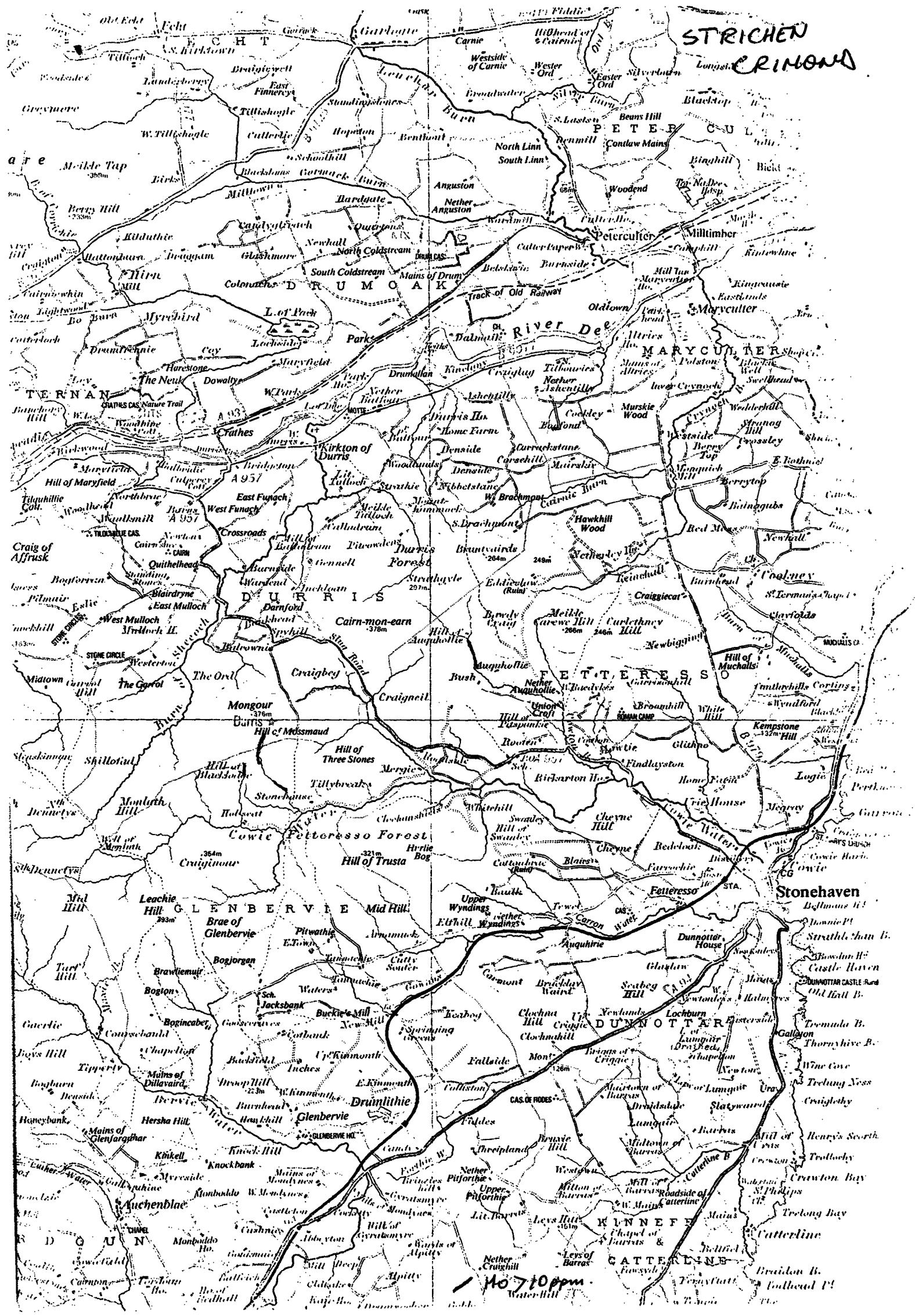


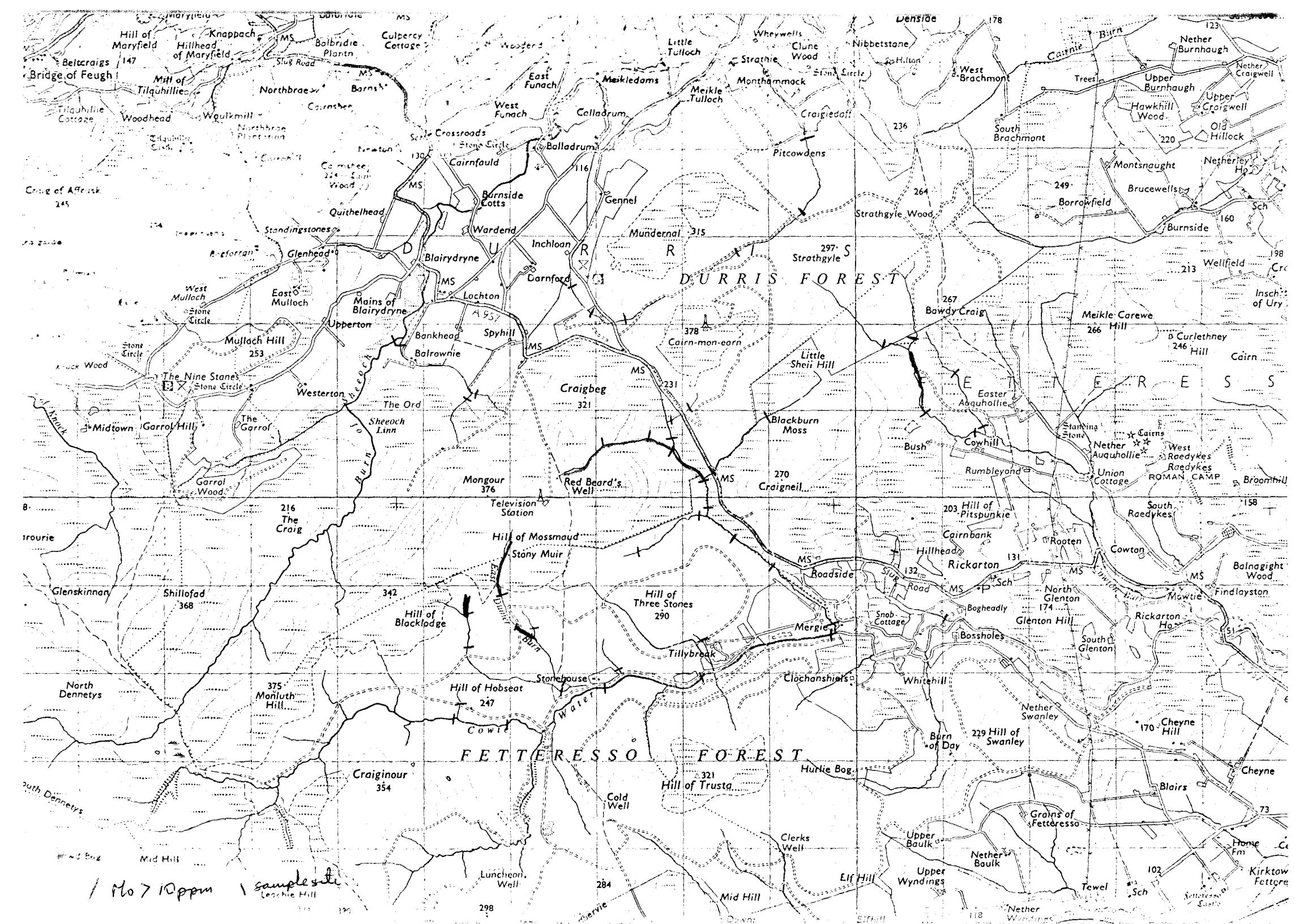
EXPLORATION VENTURES LIMITED

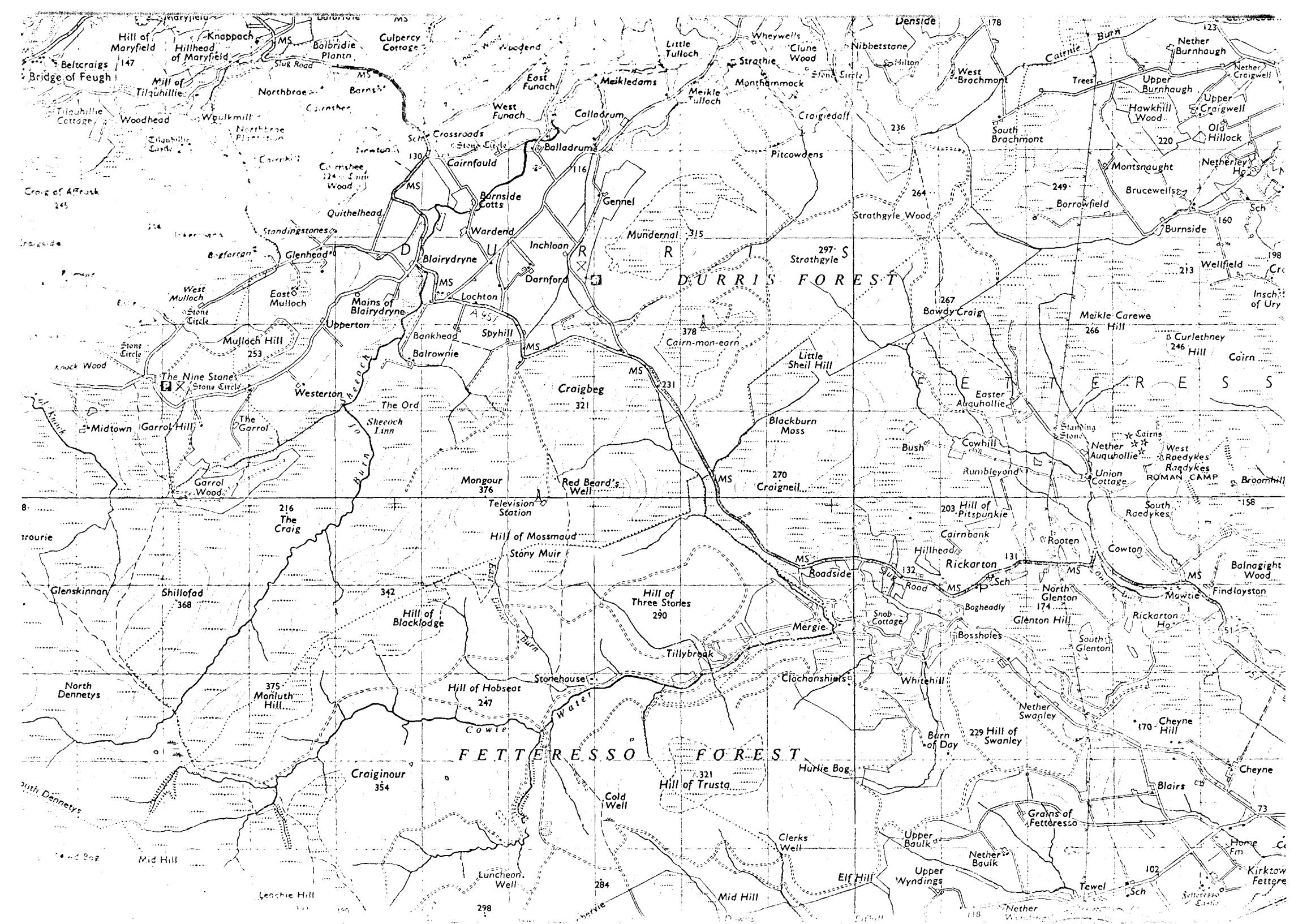
DISTRICT LOCATION MAP:-

STRICHEN - CRIMOND.

**STRICHEN
CRIMSON**







GEOLOGICAL NOTES ON O.S. SHEET NK 05 NE

STRICHEN-CRIMOND DISTRICT

Hardly any float was found in this region. In many fields, especially round the coast, there was no float at all. In a few walls beside Crimond Airfield there was an abundance of biotite gneiss with numerous occurrences of gabbroic basics in the same vicinity. Other areas with float were around Rattray House, where assorted gneisses and some coarse grained granite were found. To the west of this, some blocks of mica schists were found in walls. The only other rocks found were quartzite - usually in rounded boulders - and a siliceous hornfels, which were sparsely distributed.

GEOLOGICAL NOTES ON O.S. SHEET NK 06 SW
STRICHEN-CRIMOND DISTRICT

As the most cursory examination of the map indicates, there are very few concentrations of basic float in this area of Dalradian metamorphics.

Due to the presence of a thick overburden, mainly of sand, a large (disused) air field and golf course, there is very little float north of grid line 63. In this area, according to some farmers, most of the rocks present at all are 'imported' - further indicated by the very rounded shape of most of the blocks. Hence the only interesting sample here is provided by a weathered calcareous schist (1) with traces of sulphide.

In the rest of the area float is generally plentiful, corresponding locally to the gneissic outcrop nearest. Most of the old manuscript outcrops are still visible and appear to be accurate in petrological terms.

Fundamentally, there is a good exposure of assorted usually coarse bictite gneisses in the centre, grading eastwards into more compacted, occasionally crystalline blue gneisses which also appear to the extreme south, (18). Westwards from this, the quarry of 011608 (9) exposes a very pure siliceous schist - virtually a quartzite. This siliceous float is more abundant towards the west, but rounded blocks extend across to the eastern areas as well. Vein quartz - invariably barren - is present as fairly angular blocks in most walls, but never in appreciable concentrations. Pegmatite has a similar light distribution.

A fine biotite schist (19) outcrops in the extreme south, but float is fairly localised with no extensive distribution.

Throughout the area rounded gabbro and doleritic blocks occasionally occur, no basic outcrop noted. The only significant concentrations occur in the east-south centre.

Very little noticeable sulphides occur in the area as a whole, although a minor concentration - pyrites in a few blocks of very rusty weathered quartzite and contaminated basic - appears in the vicinity of 010603.

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(RIOFINEX)

1972 ACTIVITY REPORT

THE STRICHEN - CRIMOND DISTRICT (DTI Code AE 28)

SUMMARY

In January and February 1972 extension soil lines were sampled in the Rathen, area to assess more fully the locality and delimit the molybdenum anomaly more precisely.

1. GEOLOGY Nil

2. GEOCHEMISTRY

Weak molybdenum anomalies were delimited to the east of Rathen, chromium values were in the background range and a few samples at the north of the soil grid showed anomalous copper. No encouragement has been obtained from geological or geophysical surveys over this target and it is concluded that the metal values probably relate to insignificant mineralisation.

3. GEOPHYSICS Nil

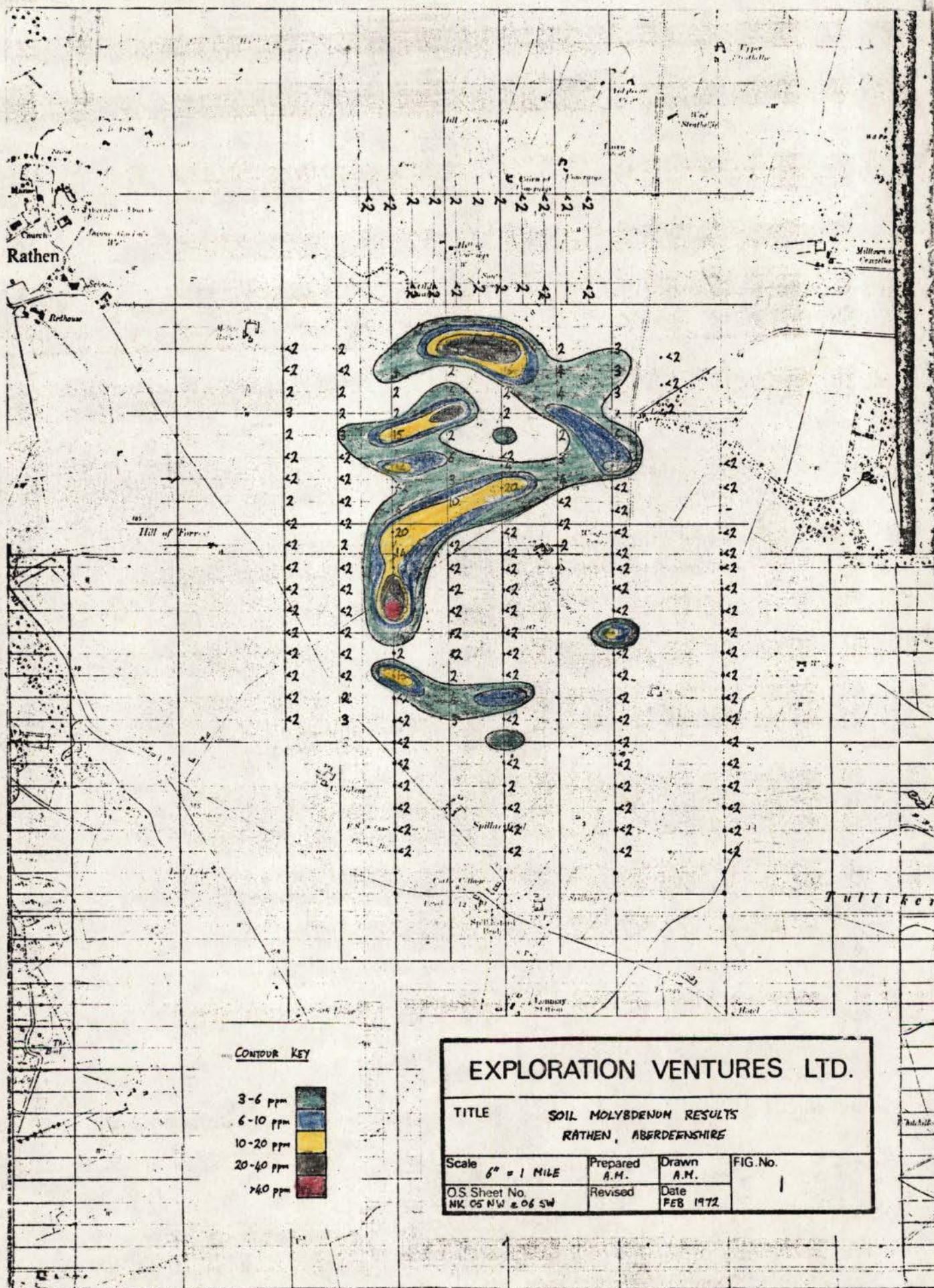
4. DRILLING Nil

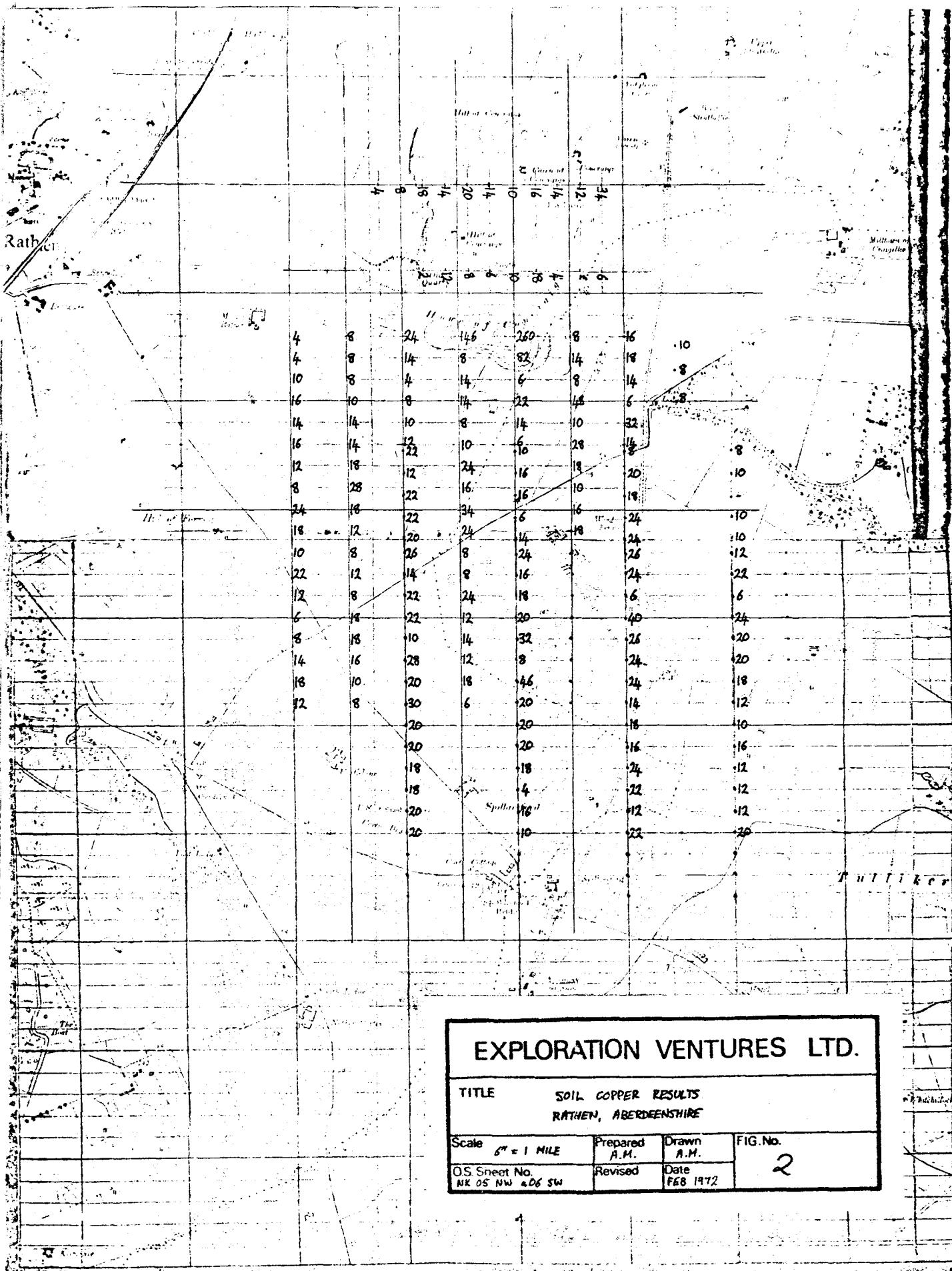
Enclosures

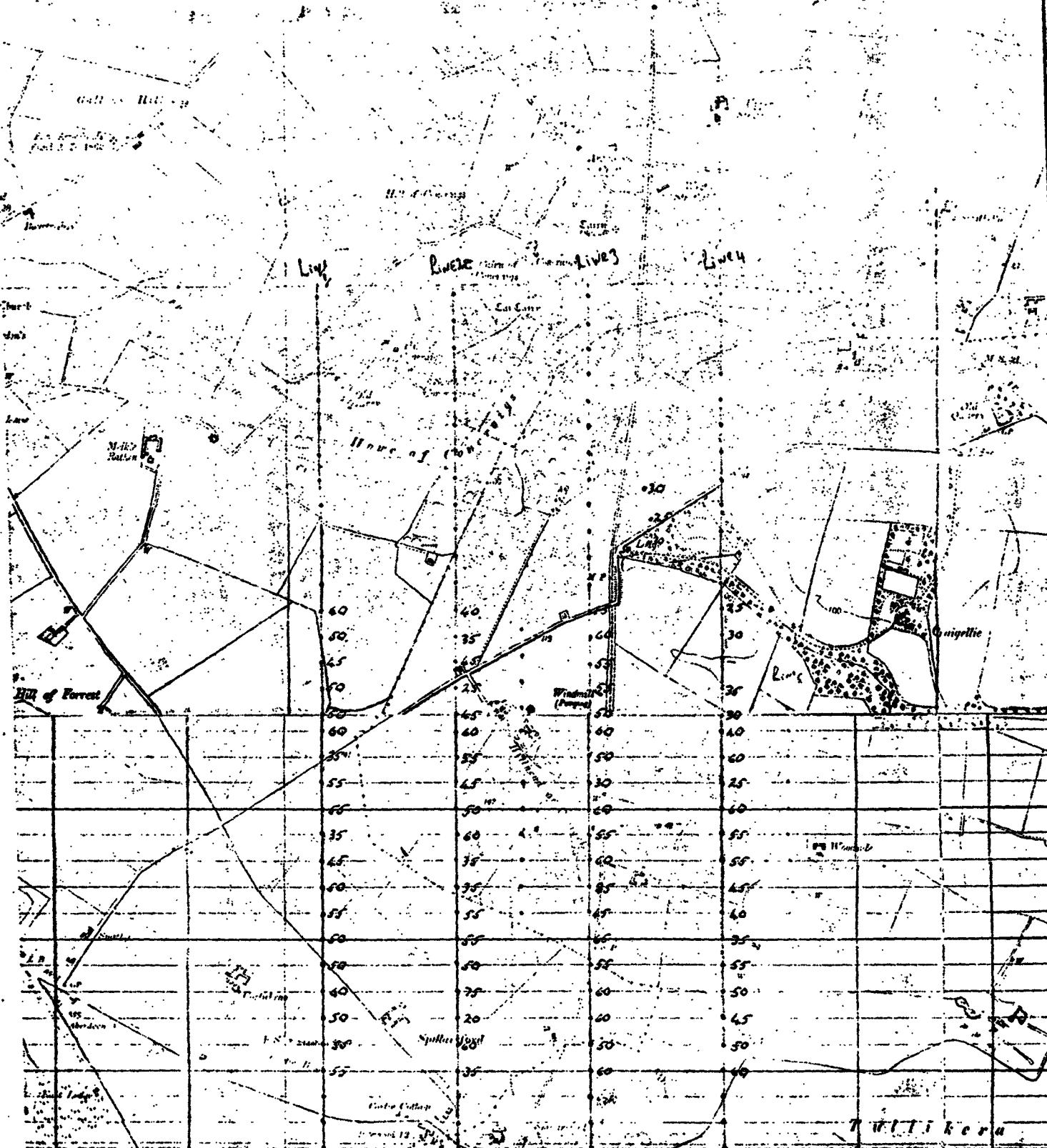
(i) Molybdenum results

(ii) Copper results

(iii) Chromium results







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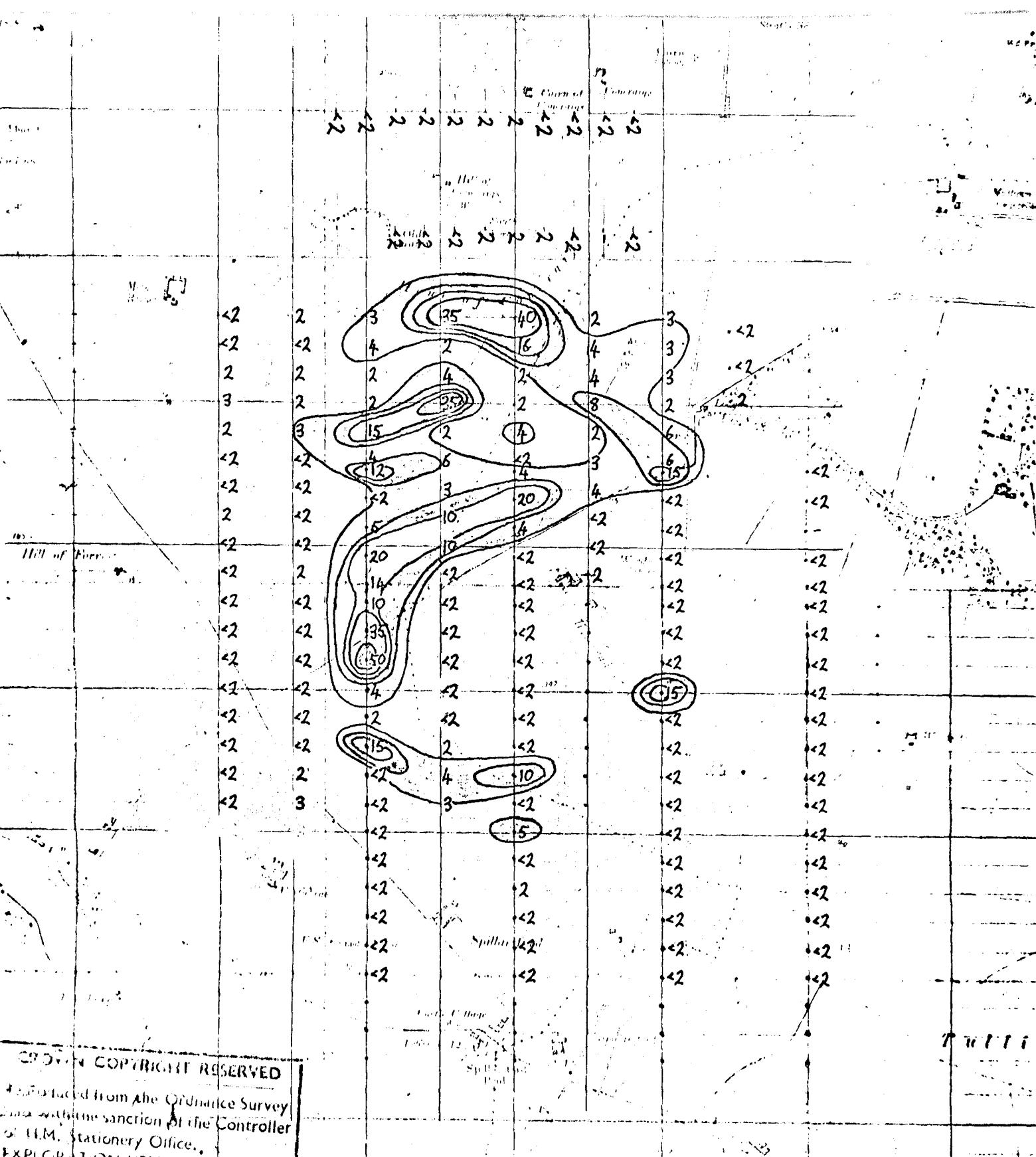
**TITLE SOIL CHROMIUM RESULTS
RATHEN, ABERDEENSHIRE**

Scale 6" = 1 MILE	Prepared D.H.	Drawn D.H.	FIG.No.
O.S. Sheet No. NK 05 SW	Revised	Date JAN 1972	3

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Map with the sanction of the Controller
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EXPLORATION VENTURES LTD.
Ellon, Aberdeenshire.

EXPLORATION VENTURES LTD.

TITLE	STRICHEN - CRIMOND DISTRICT. SOIL COPPER RESULTS RATHEN, ABERDEENSHIRE		units : parts per million	
	Scale 6" = 1 MILE	Prepared A.M.	Drawn A.M.	FIG NO
OS Sheet No. NK 05 NW 206 SW	Revised	Date DEC 1971		



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CONTOUR KEY

- 3 - 6 ppm
- 6 - 10 ppm
- 10 - 20 ppm
- 20 - 40 ppm
- > 40 ppm

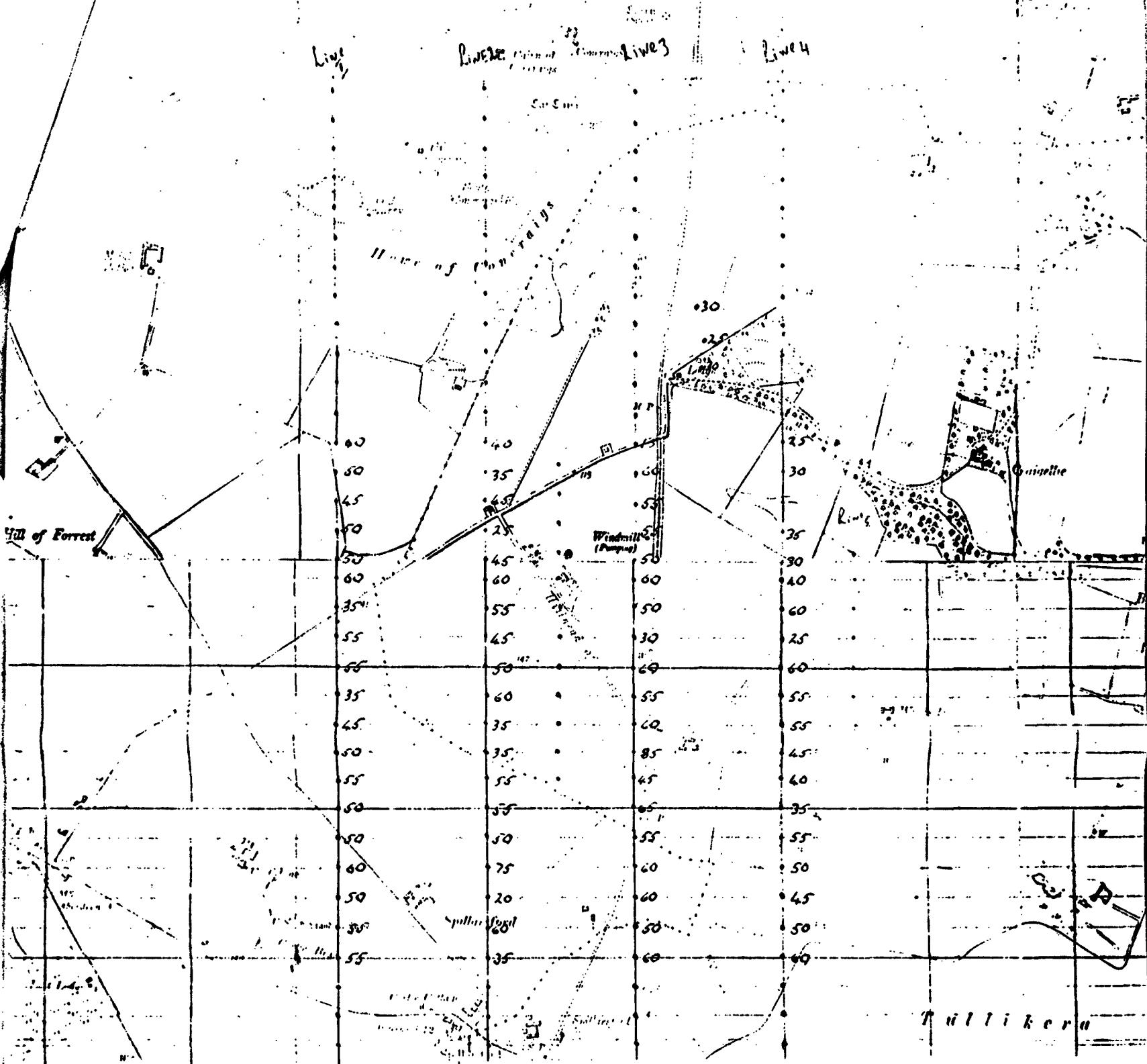
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TITLE

STRICHEN - CRIMOND DISTRICT.

units: parts per million

Scale 6" = 1 MILE	Prepared A.M.	Drawn A.M.	FIG No
OS Sheet No. NK 05 NW & 06 SW	Revised	Date DEC. 1971	



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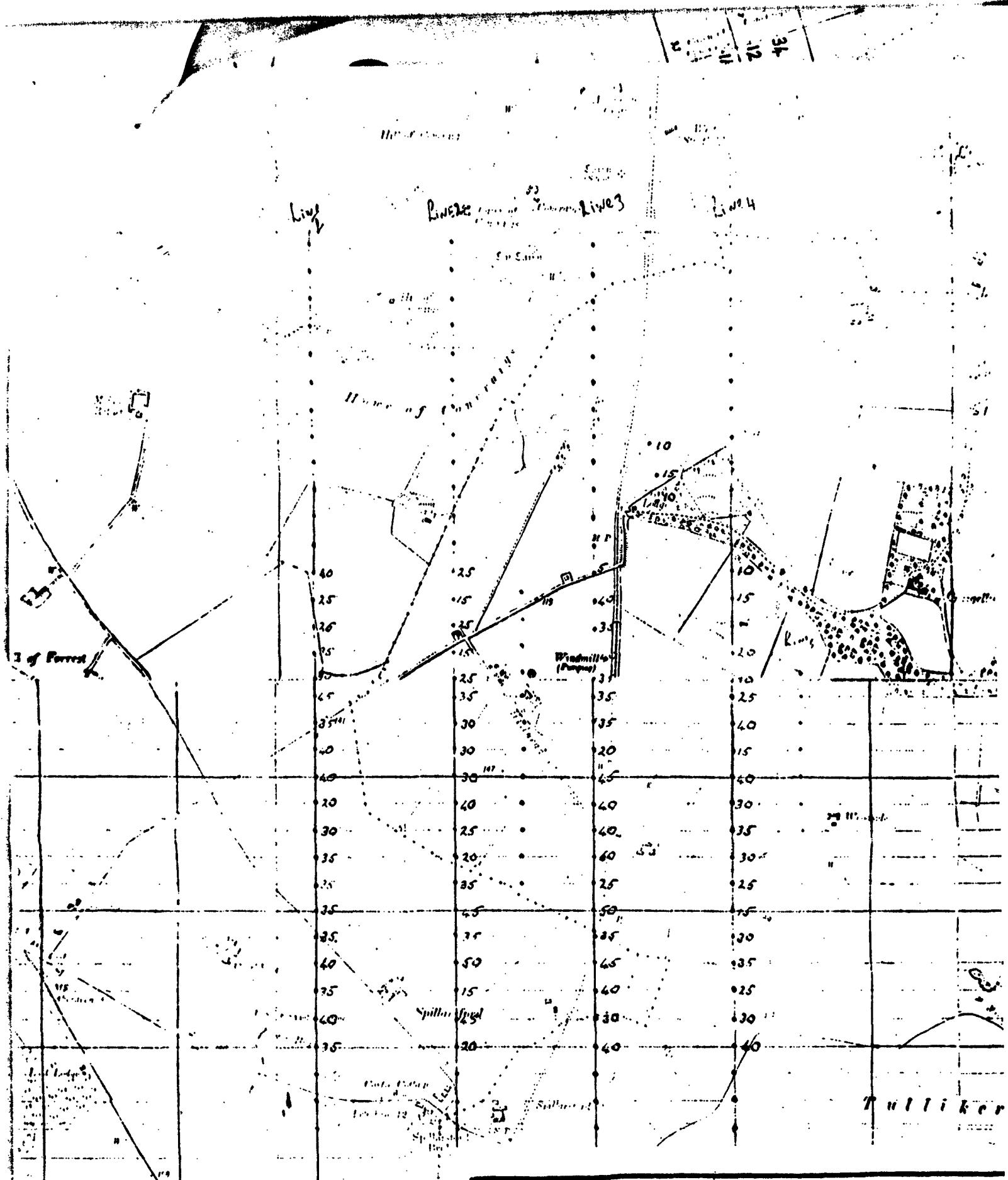
TITLE STRICHEN - CRIMOND DISTRICT.
SOIL CHROMIUM RESULTS
RATHEN, ABERDEENSHIRE

units: parts per million

Scale 6" = 1 MILE	Prepared D.H.	Drawn D.H.	FIG. No.
OS Sheet No. NK 06 SW	Revised	Date DEC 1971	

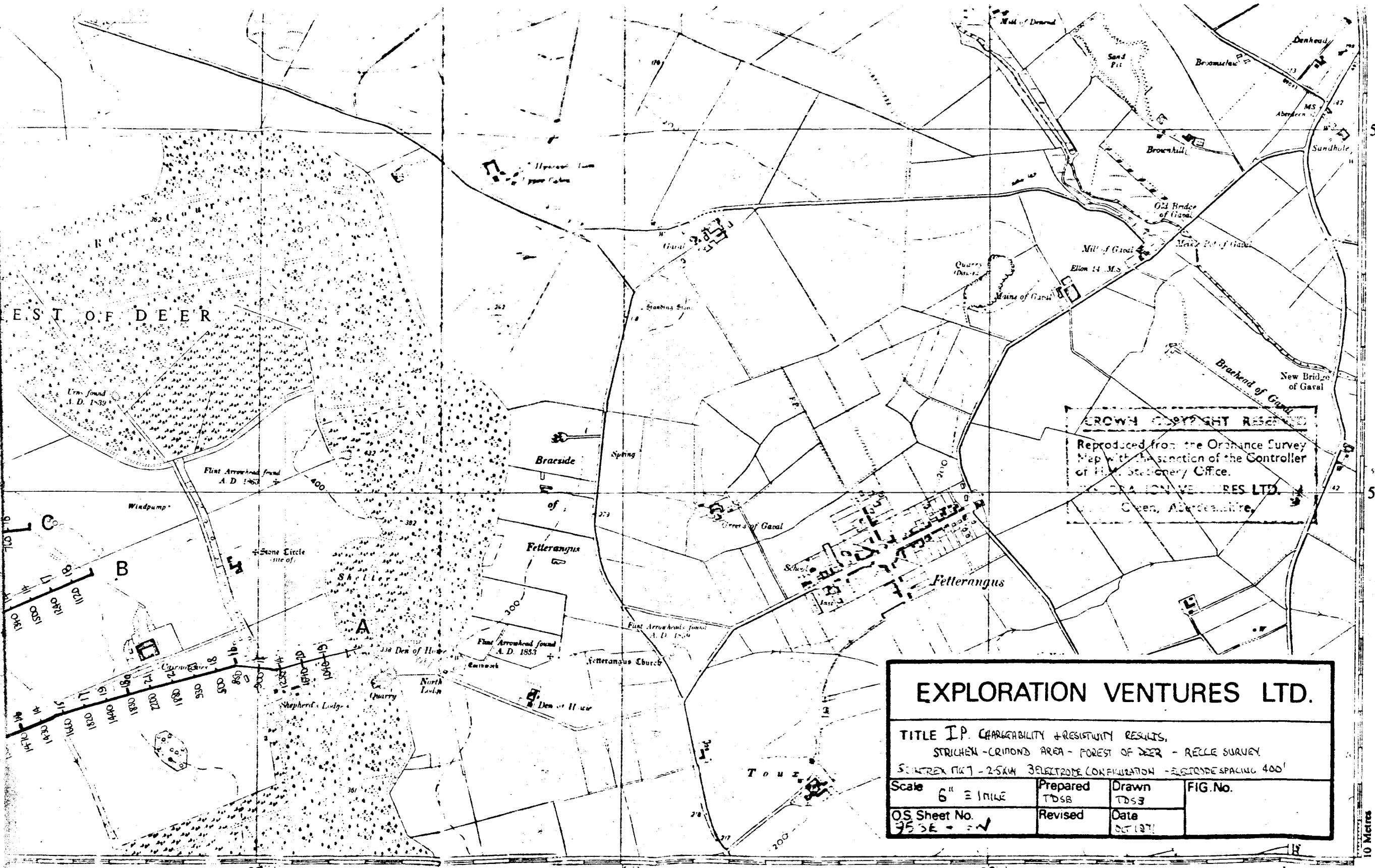
On the Ordnance Survey
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Survey Controller
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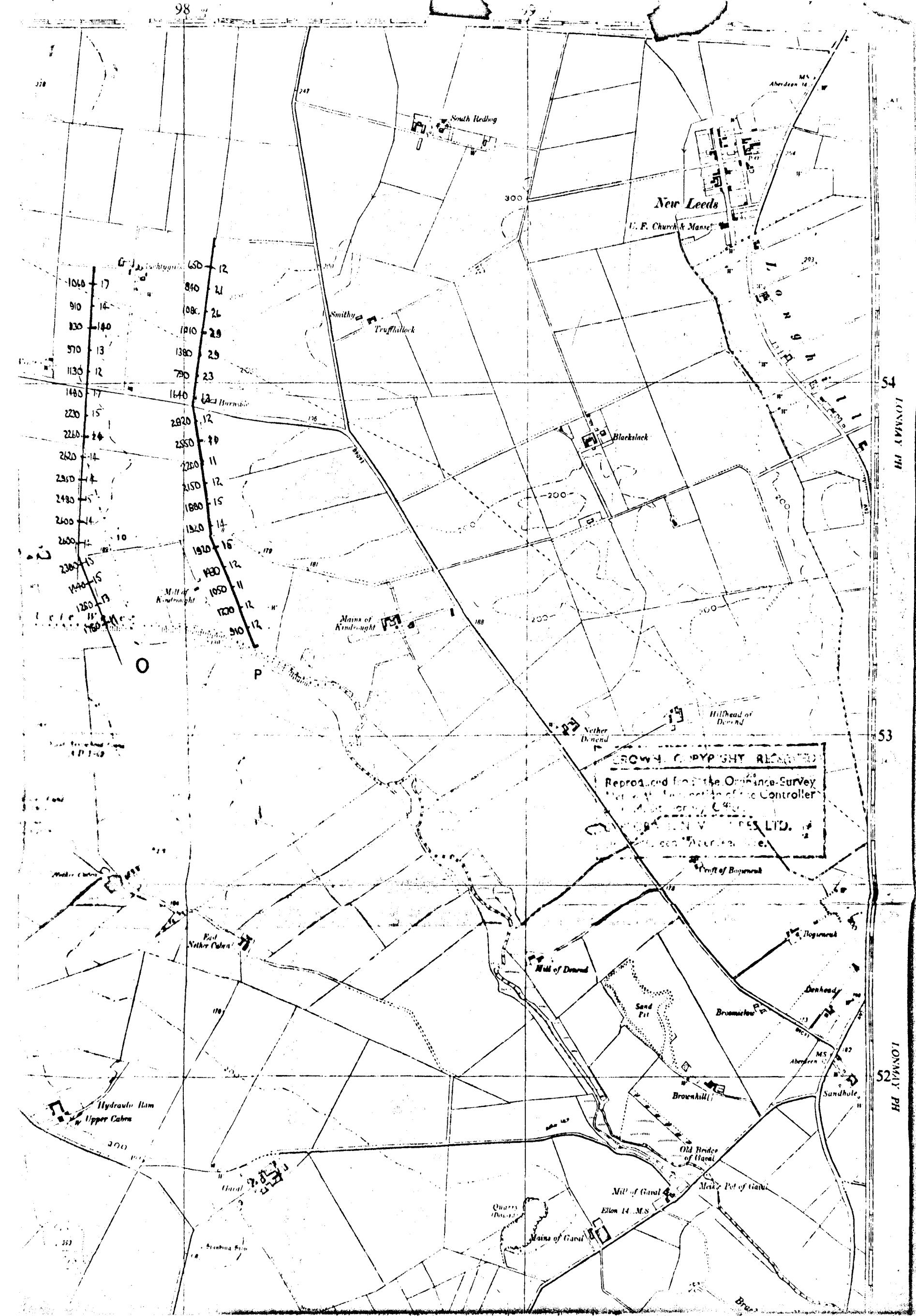
Ellon, Aberdeenshire.

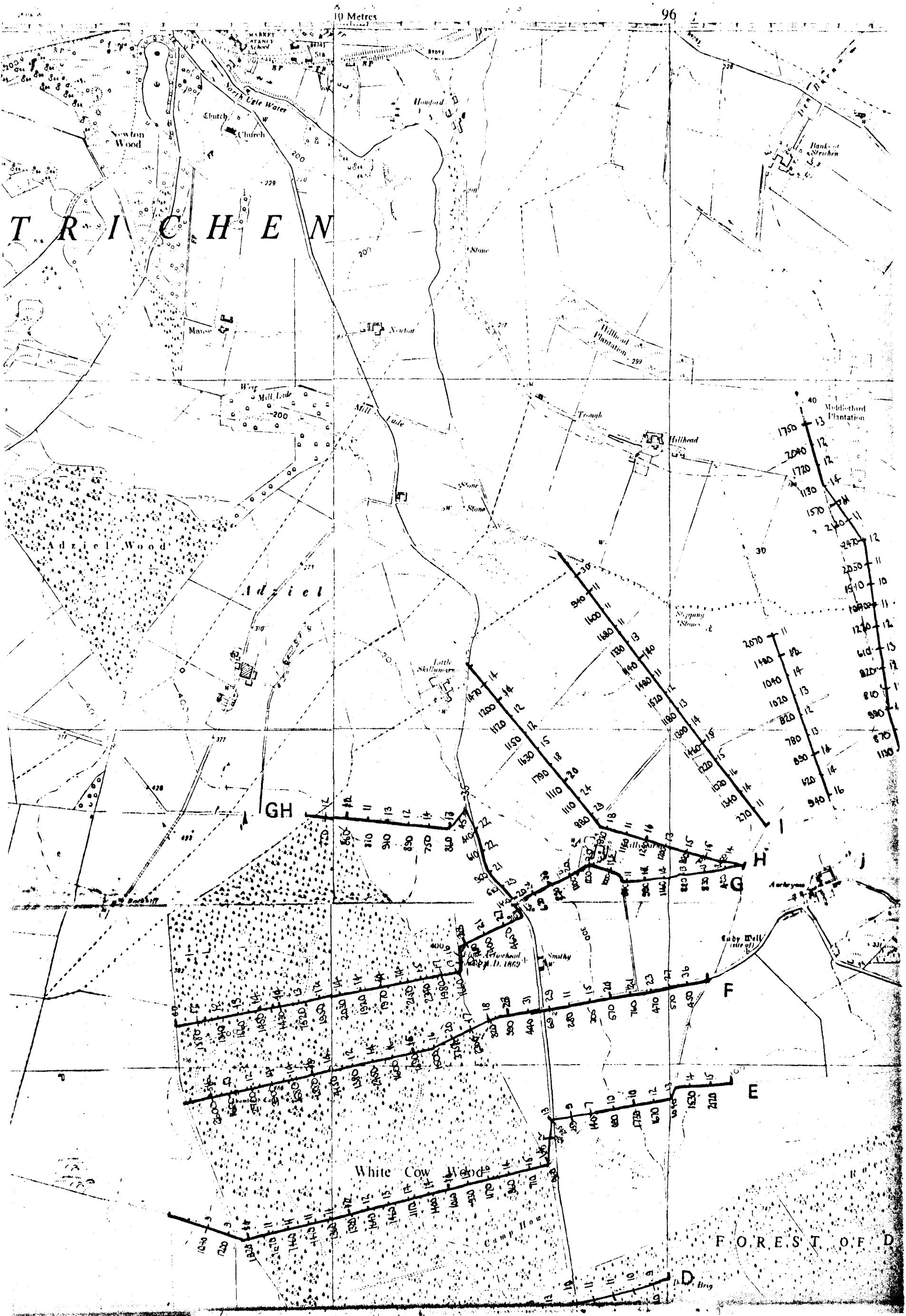


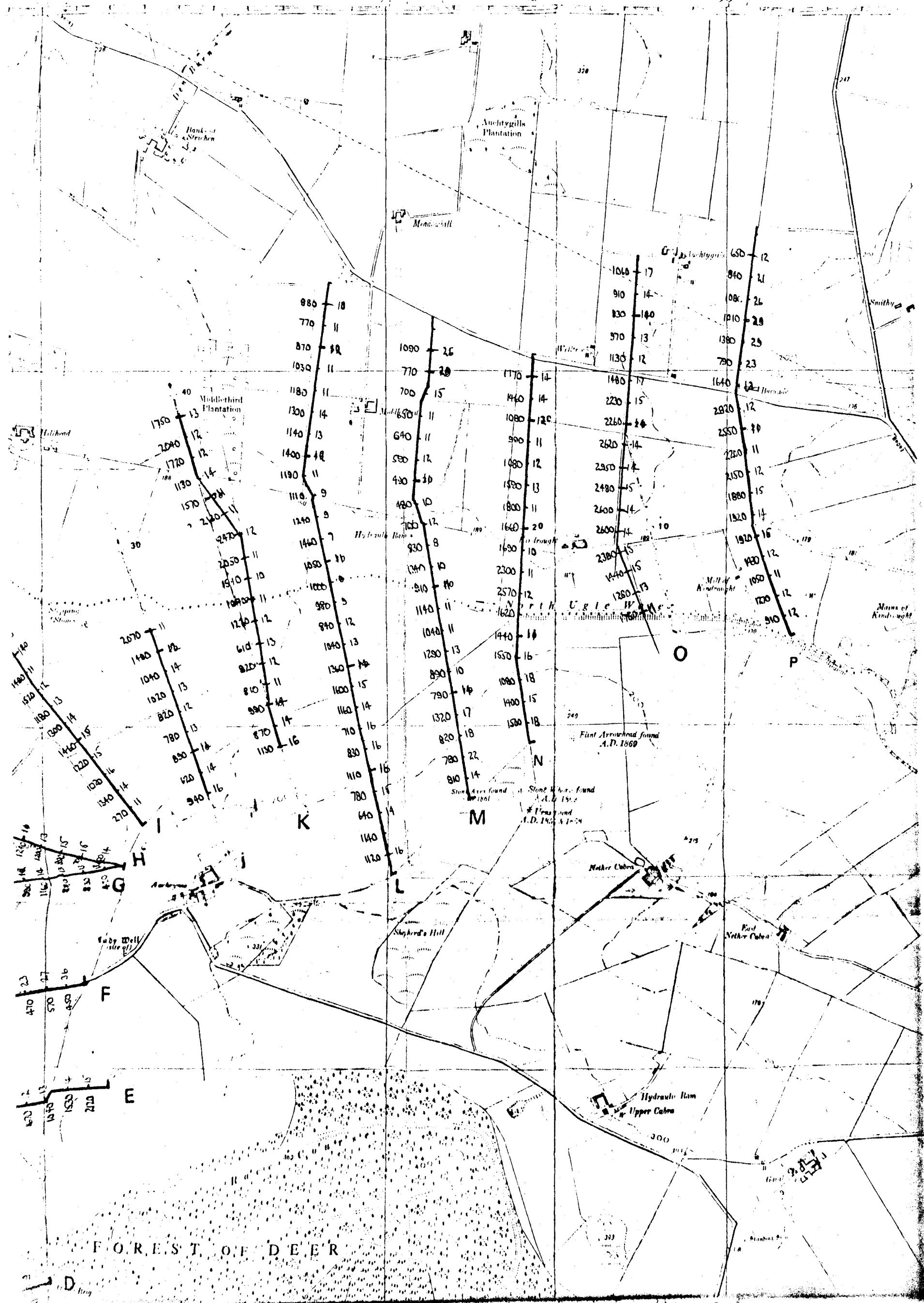
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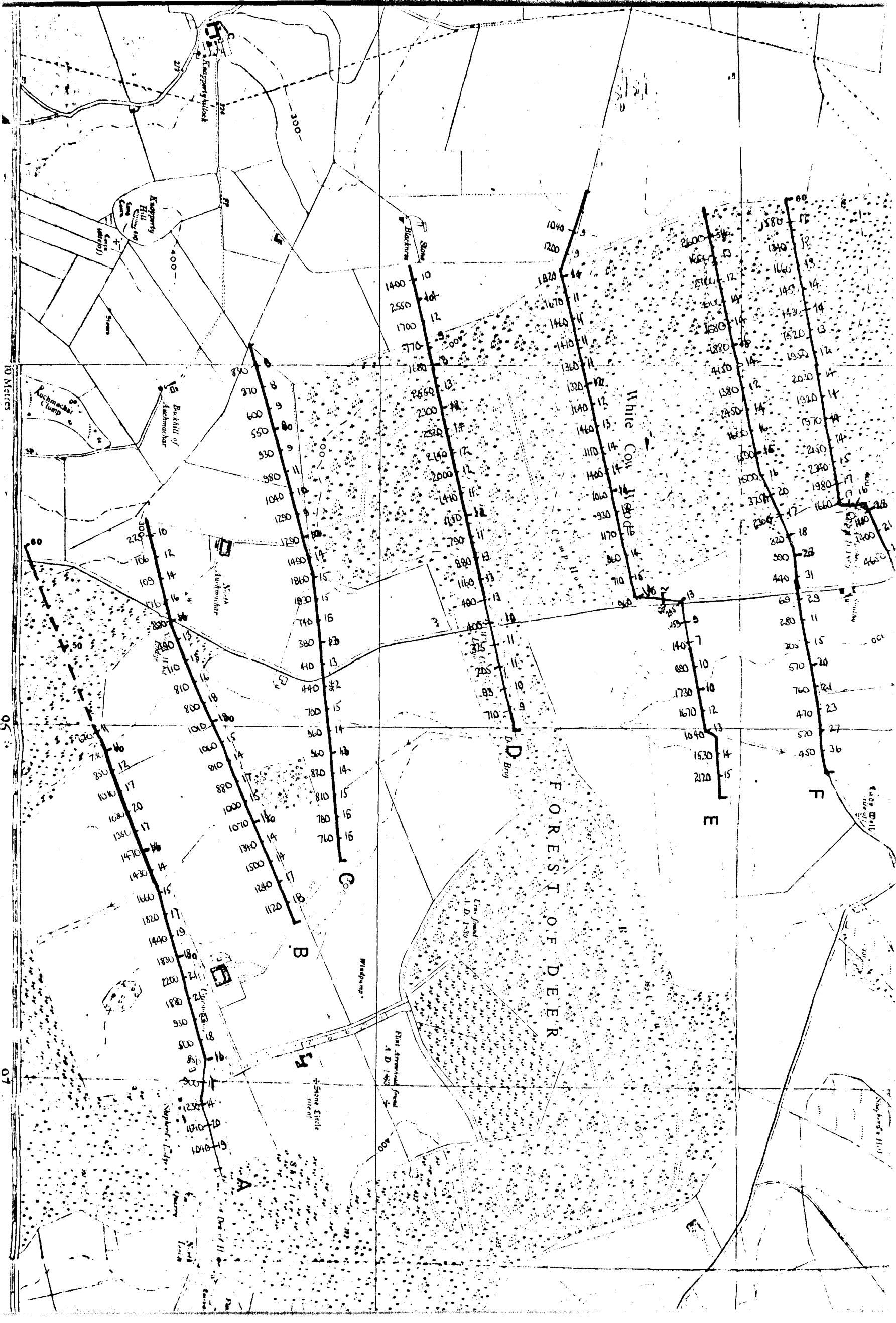
TITLE	STRICHEN - CRIMOND DISTRICT. SOIL NICKEL RESULTS RATHEN, ABERDEENSHIRE			units: parts per million
	Scale 6" = 1 MILE	Prepared D.H.	Drawn D.H.	
O.S. Sheet No. NK 06 SW		Revised	Date DEC. 1971	iv

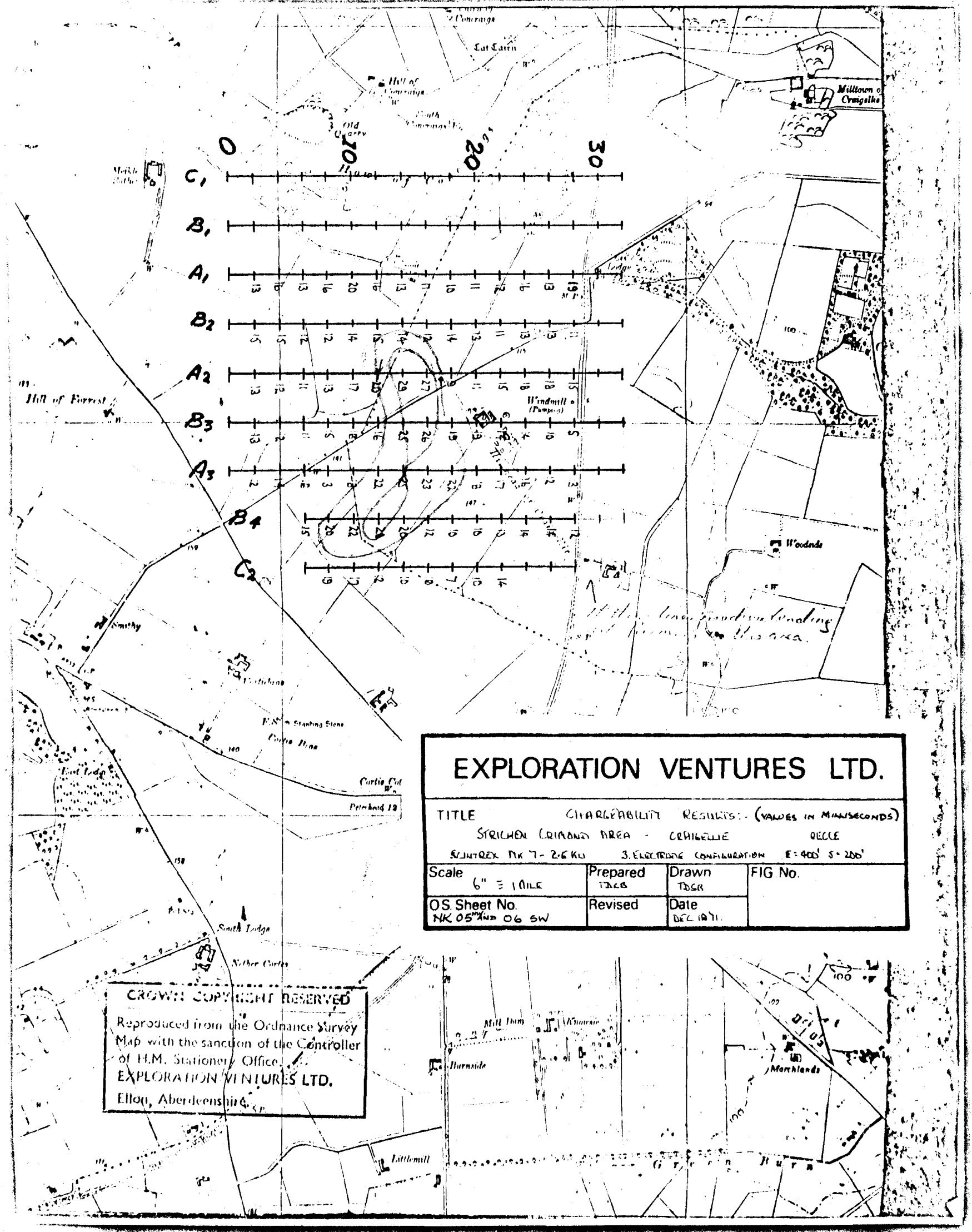


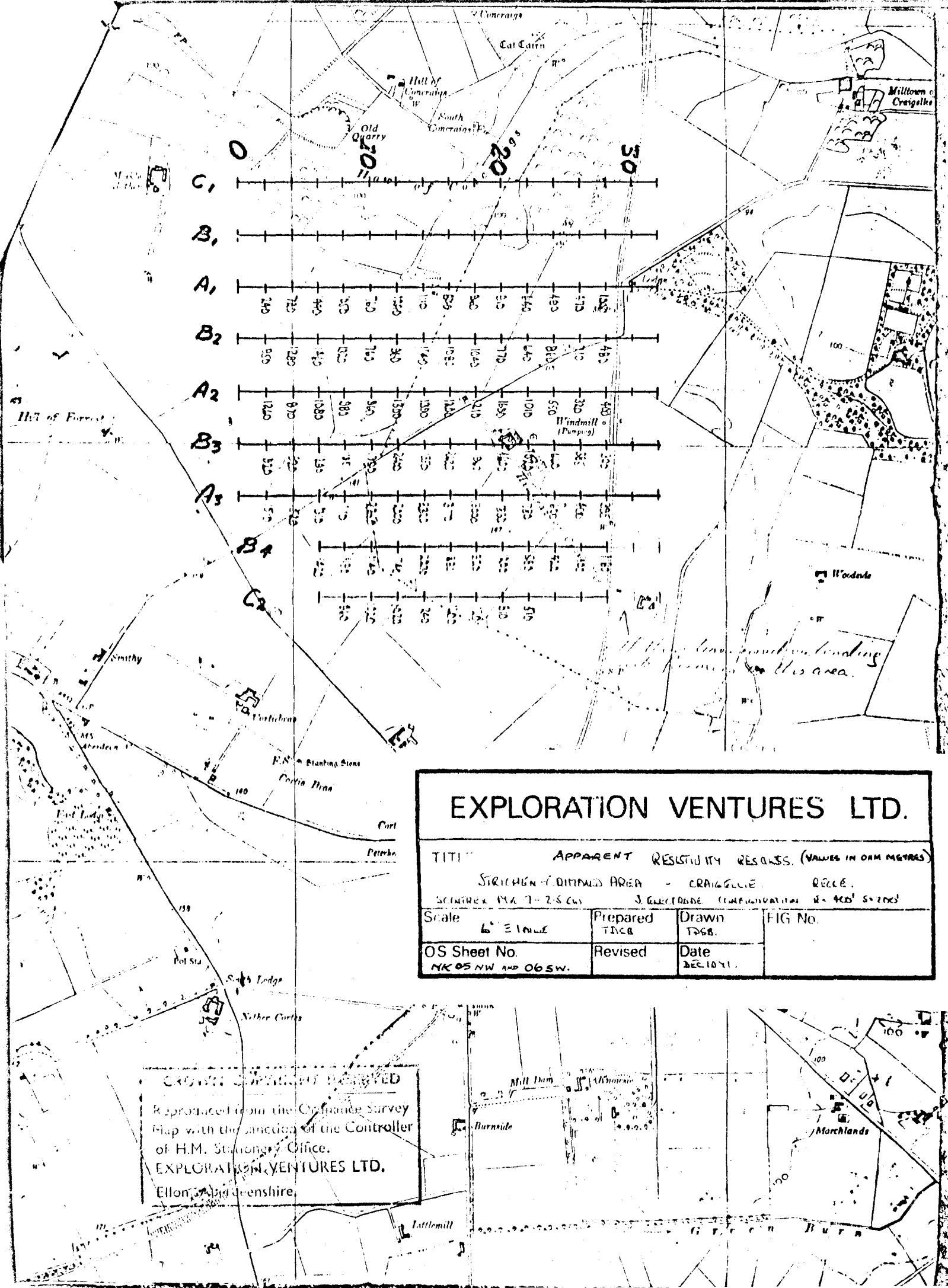


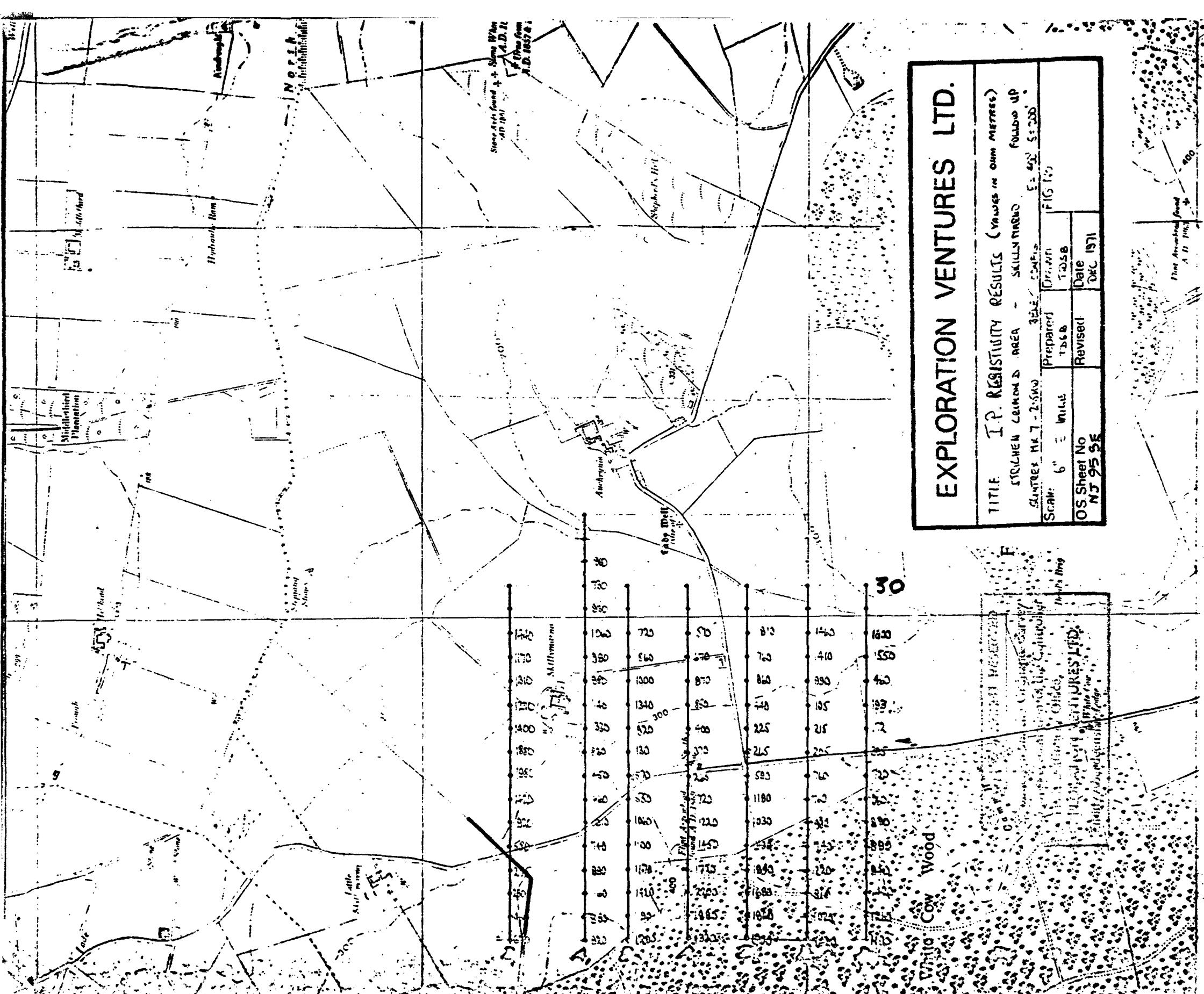












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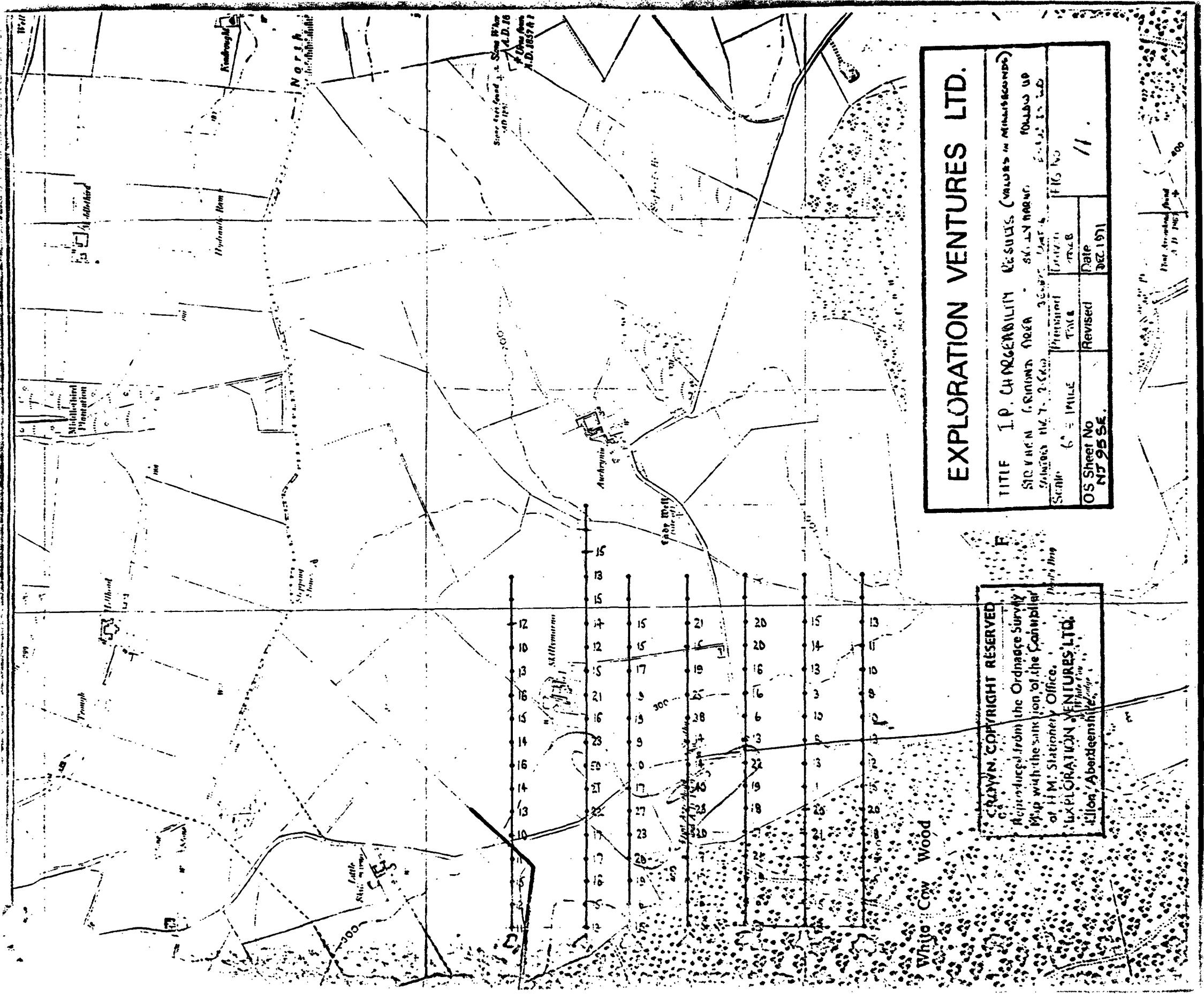
TITLE: T.P. RESISTIVITY RESULTS (VALUES IN OHM METRES)			
STATION: CLOMEND AREA - SKILLAGA		FOLDED UP	
STATIONS: H.M. 7 - 2.5MW	3000'	DATE:	FIG 1,2
SCALE: 6"	1 mils	Prepared	Date
OS Sheet No	N.J. 295 S.E.	Revised	Dec. 1971

EXPLORATION VENTURES LTD.

TITLE	I.P. CHARTABILITY	RESULTS (VALUES IN MILLIGRAMS)
STC VENTURE LTD.	1. RINGWOOD AREA	2. LYNEHURST
STC VENTURE LTD.	2. CROWFOOT	3. GLENBROOK
STC VENTURE LTD.	3. STONEFIELD	4. TILBURN
STC VENTURE LTD.	4. MILE END	5. TILBURN
OS Sheet No	Revised	Date
N5 95 SE.	DEC 1971	11

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11, Aberdeen Street,
London, EC4.

White Cow Wood



08

09

10

NK 05 NE.

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TITLE STRICHEN - CRIMOND DISTRICT.
GEOLOGICAL FIELD SHEET.

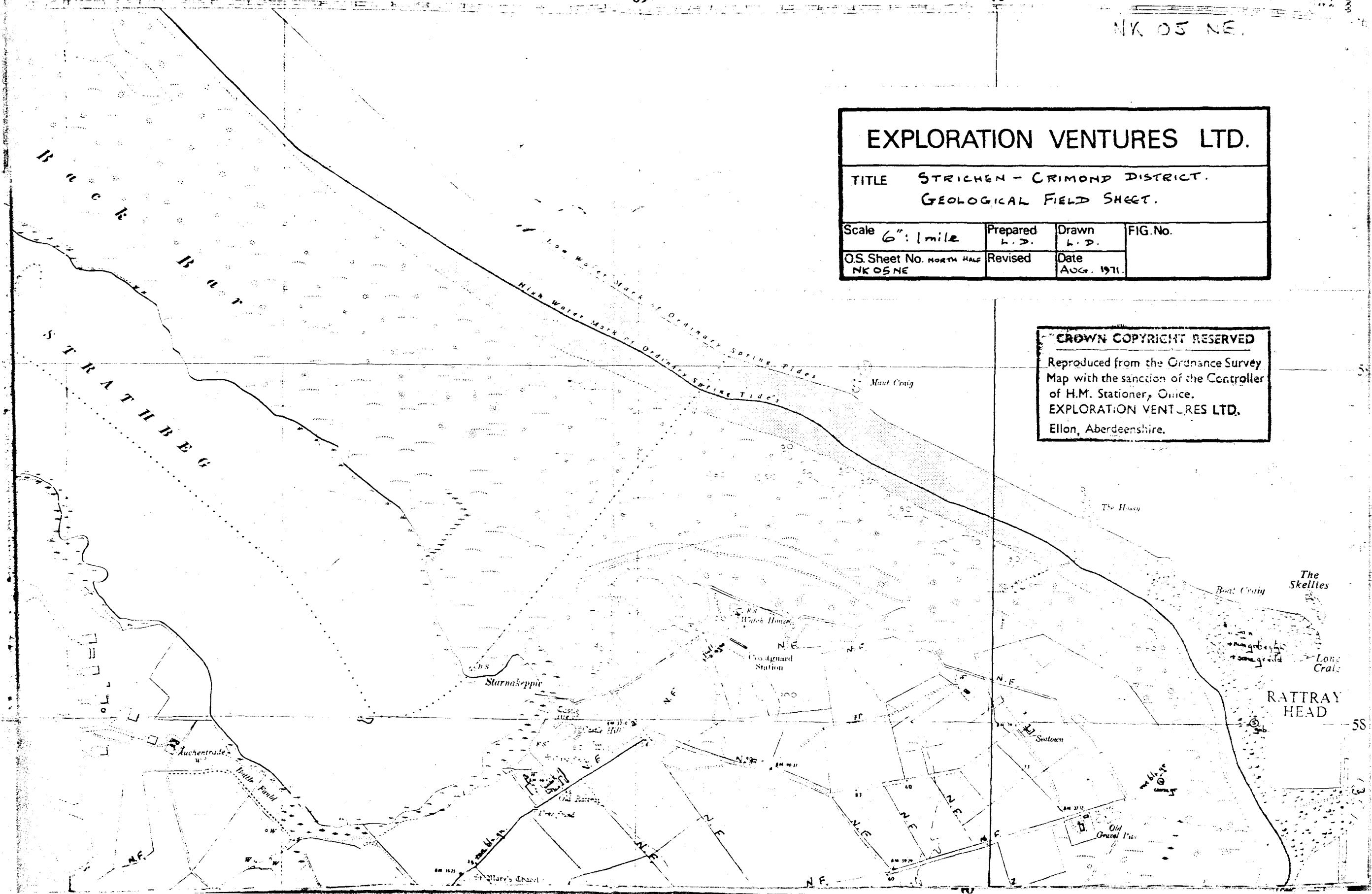
Scale 6": 1 mile	Prepared L.D.	Drawn L.D.	FIG.No.
O.S. Sheet No. NORTH HALF NK 05 NE	Revised	Date AUG. 1971.	

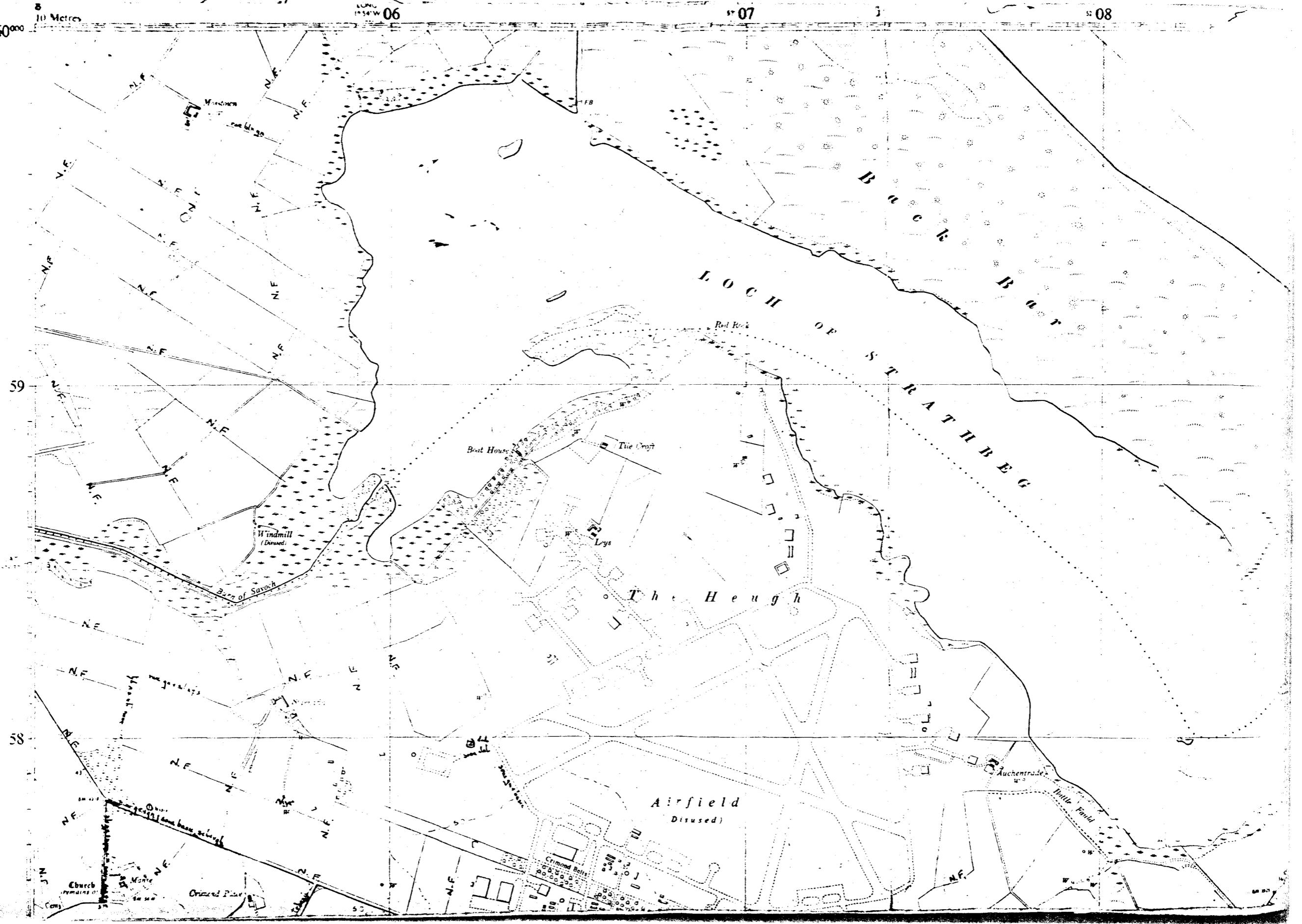
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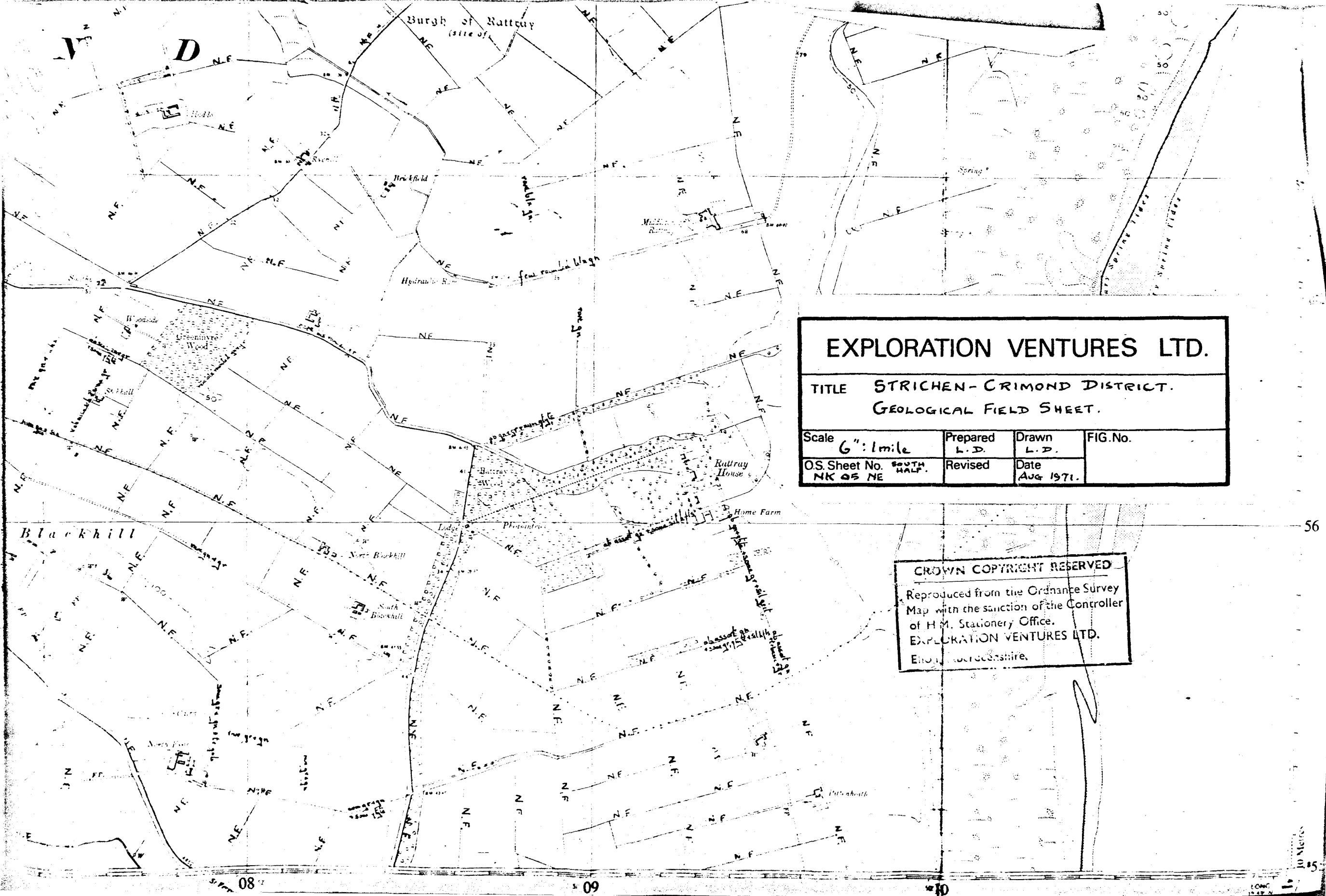
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Ellon, Aberdeenshire.







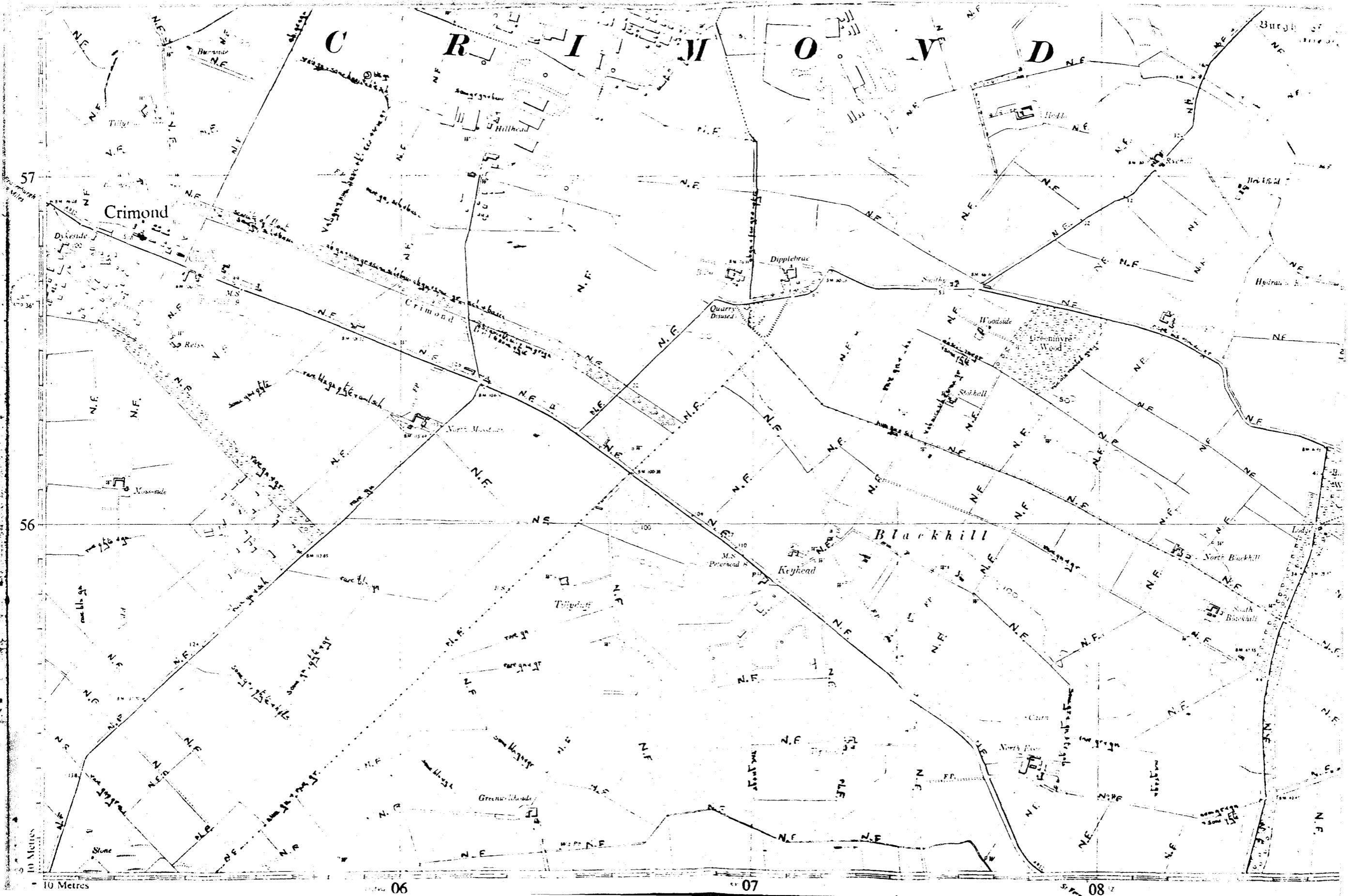
EXPLORATION VENTURES LTD.

TITLE STRICHEN-CRIMOND DISTRICT.
GEOLOGICAL FIELD SHEET.

Scale	Prepared	Drawn	FIG.No.
6": 1 mile	L.D.	L.D.	
O.S. Sheet No. ^{SOUTH HALF.} NK OS NE	Revised	Date AUG 1971.	

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From **Cheshire**.



in Metres

10 Metres

06

07

08

GEOLOGICAL NOTES ON O.S. SHEET NK 05 NE

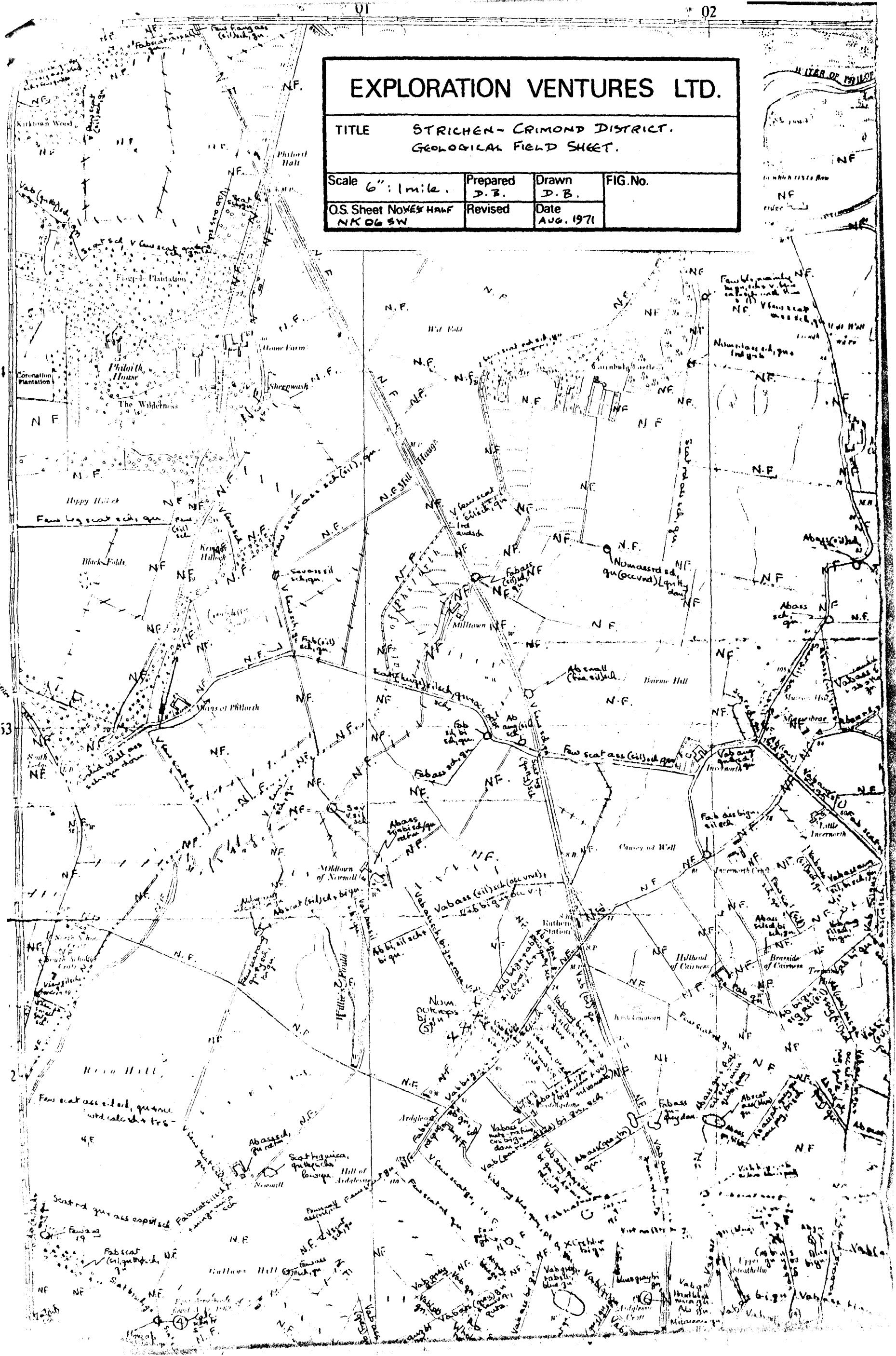
STRICHEN-CRIMOND DISTRICT

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TITLE STRICHEN - CRIMOND DISTRICT.
GEOLOGICAL FIELD SHEET.

Scale 6": 1 mile.	Prepared D. B.	Drawn D. B.	FIG. No.
O.S. Sheet NOXES & HALF N & S SW	Revised	Date AUG. 1971	



63

62

61

01

03

04

NK 06 SW

• "Great exp.
of oil, began
(?), with a sharp
dip.

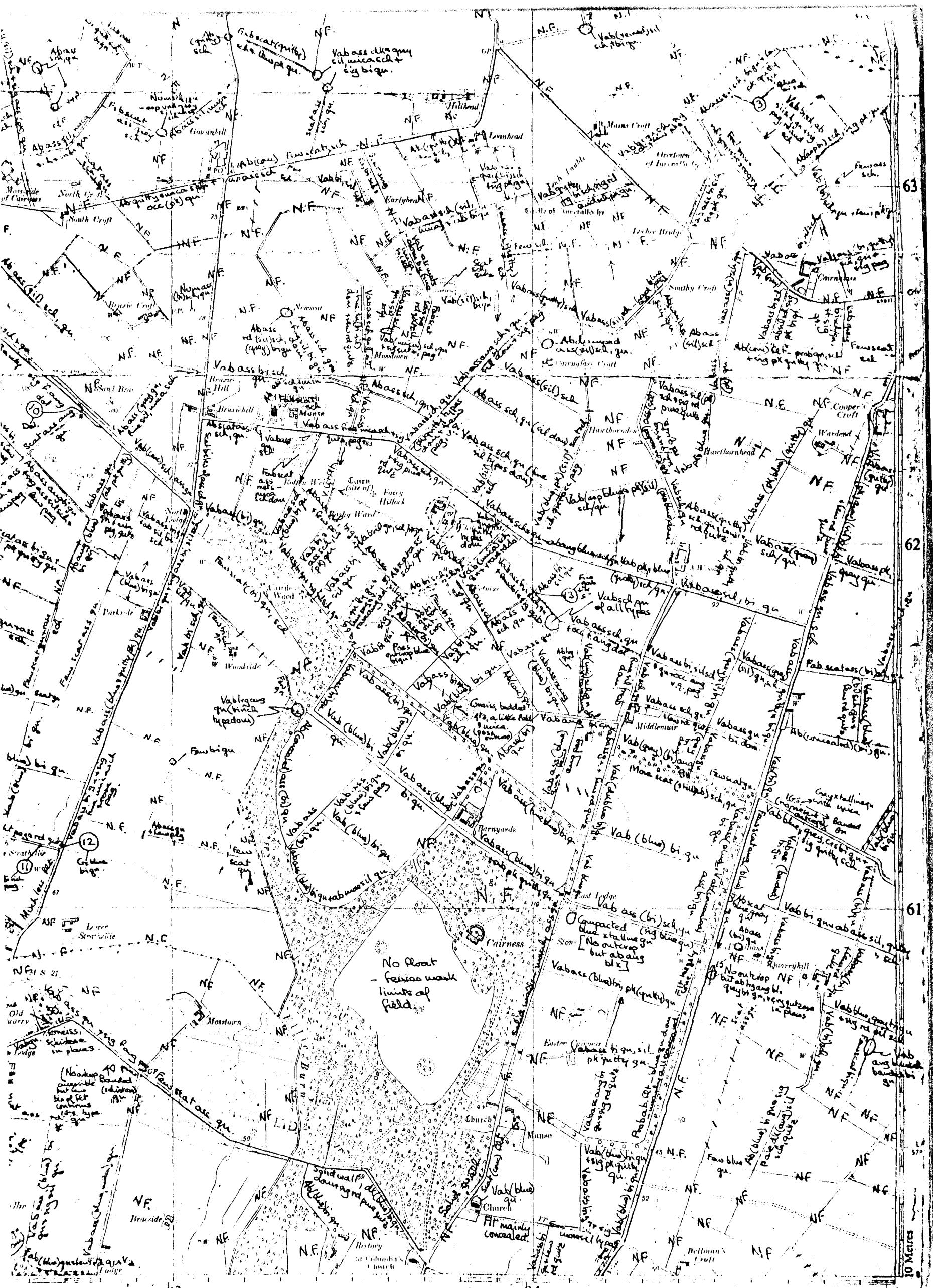
Area less f. also damaged
not like all types
affine, all soft, green.

*Airfield
(Disused)*

EXPLORATION VENTURES LTD.

TITLE STRICHEN - CRIMOND DISTRICT.
GEOLOGICAL FIELD SHEET.

Scale 6": 1 mile	Prepared D.S.	Drawn D.B.	FIG. No.
O.S. Sheet No. ^{EAST HALF.} NK 06 SW	Revised	Date AUG 1971	



GEOLOGICAL NOTES ON O.S. SHEET NK 06 SW

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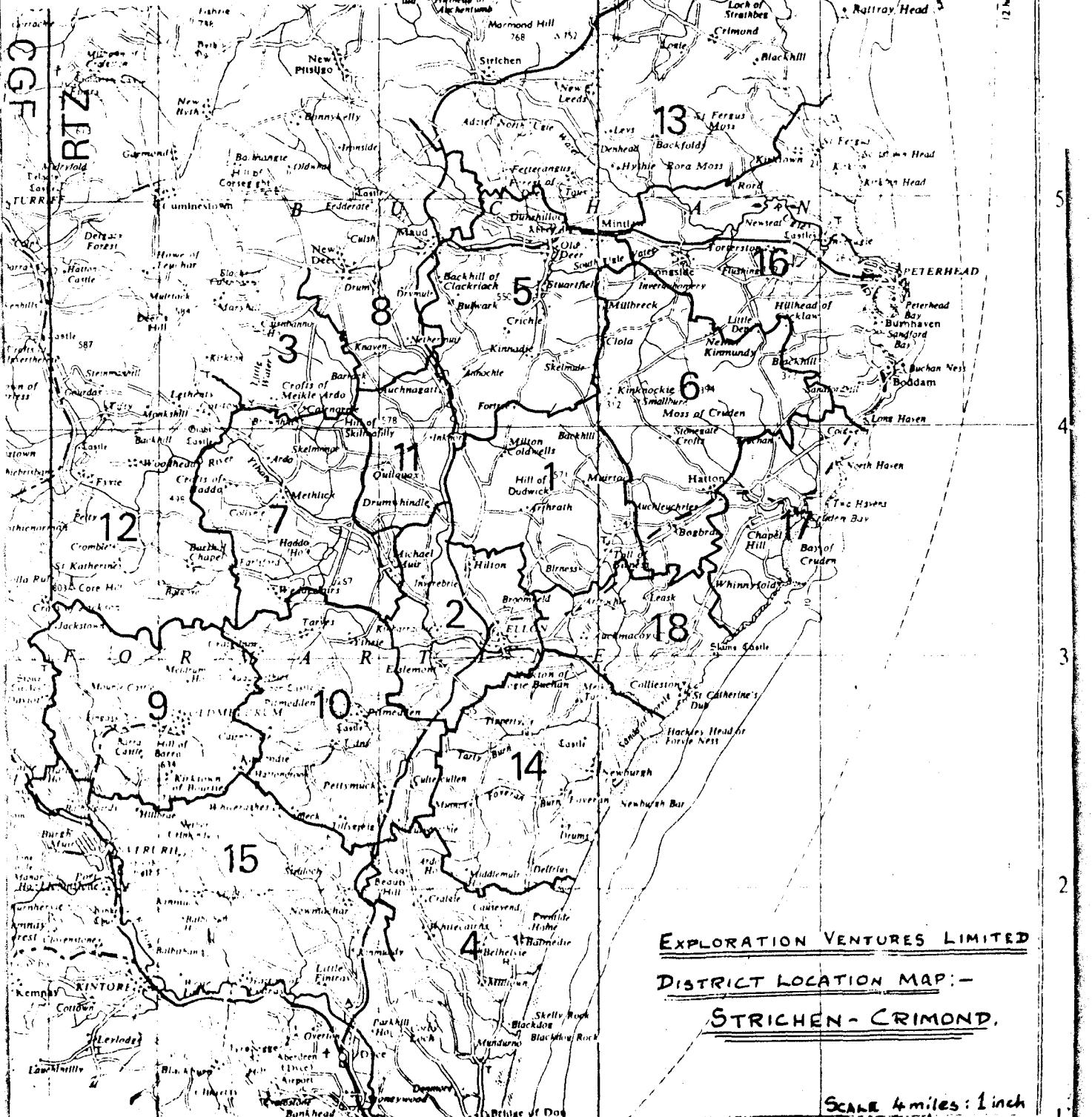
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- 4 Belhelvie
- 5 Crichie
- 6 Forest of Deer
- 7 Haddo
- 8 Maud
- 9 Oldmeldrum
- 10 Udny
- 11 Quilquoix
- 12 West Haddo
- 13 Strichen - Crimond
- 14 Newburgh
- 15 Inverurie - Straloch
- 16 Longside - Peterhead
- 17 Cruden
- 18 Slains



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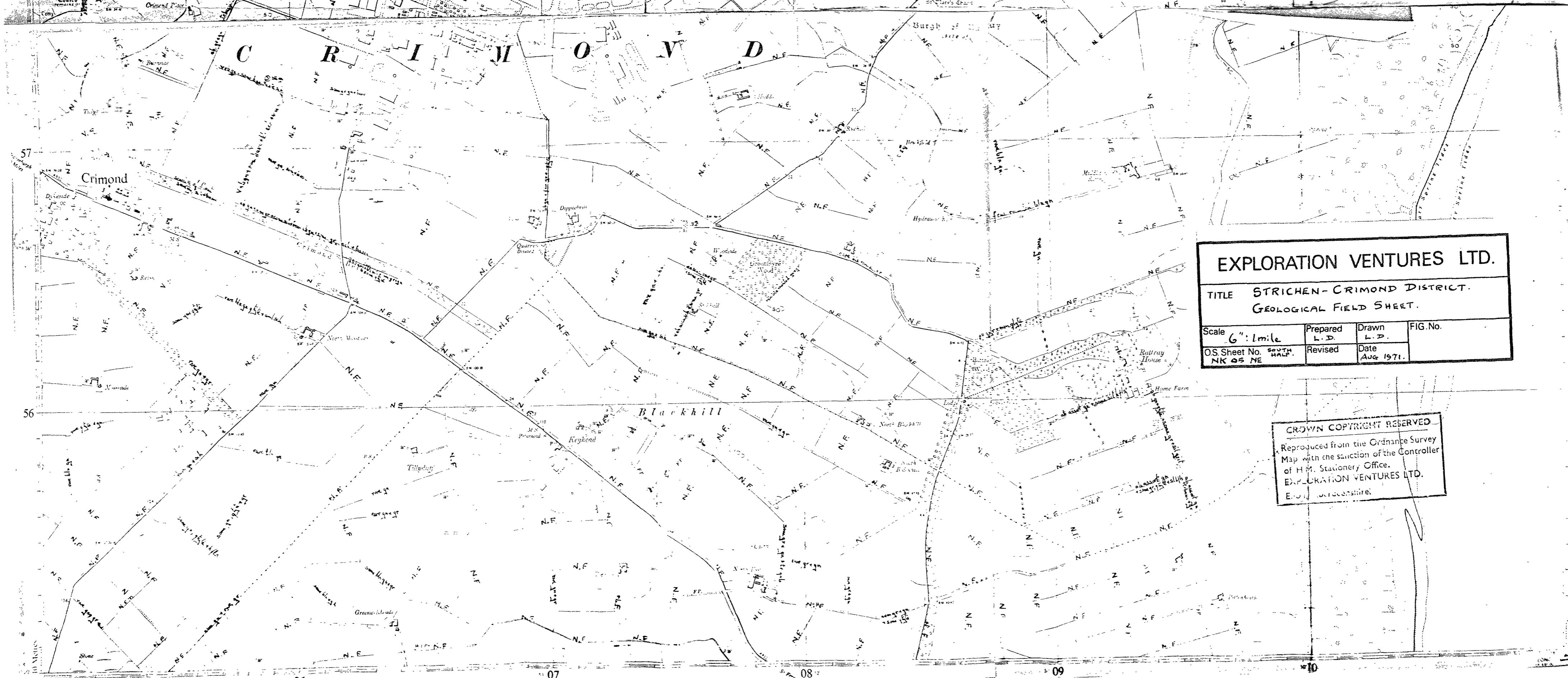
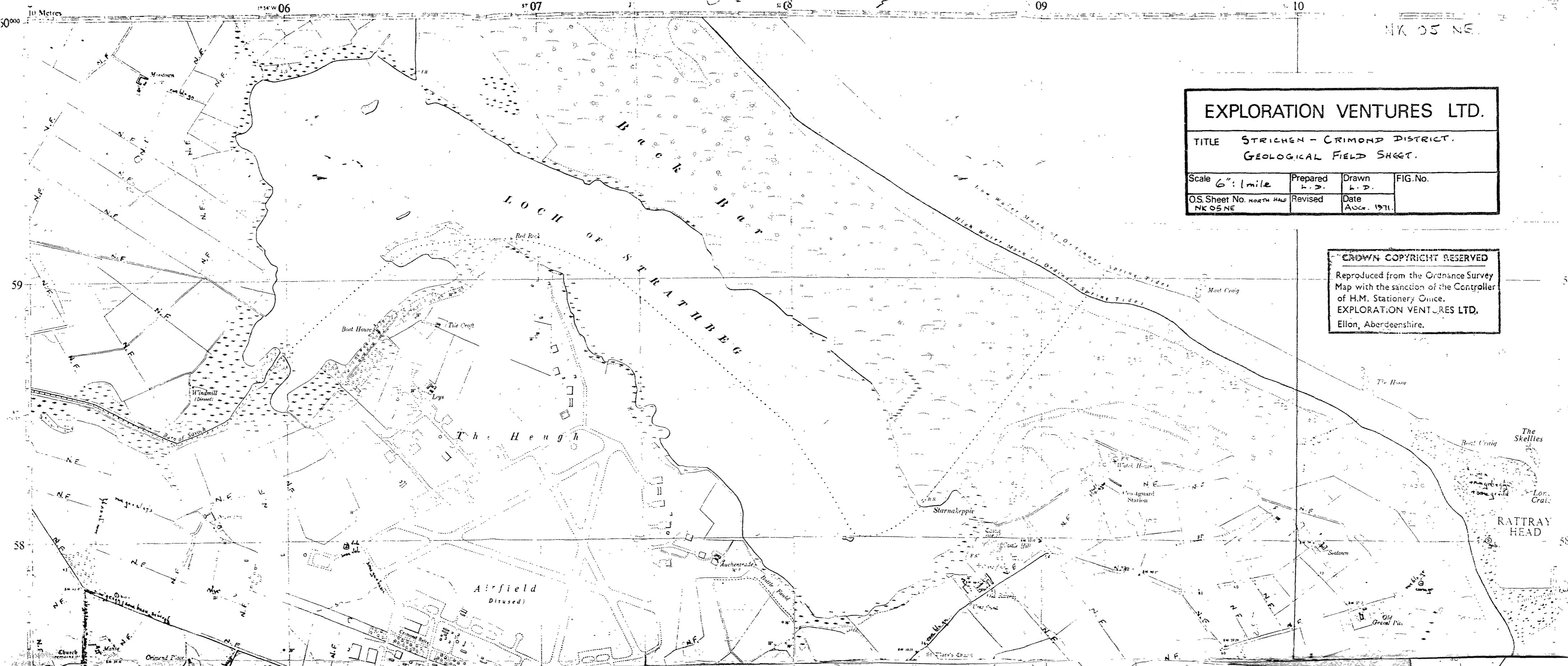
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Map with the sanction of the Committee
of H.M. Surveyor General's Office.
R.T.Z. SERV. LTD., LTD.
6, St. James' Square, London, S.W.1.

EXPLORATION VENTURES LIMITED

DISTRICT LOCATION MAP:-

STRICHEN - CRIMOND.

SCALE 4 miles : 1 inch



EXPLORATION VENTURES LTD.

TITLE STRICHEN - CRIMOND DISTRICT.
GEOLOGICAL FIELD SHEET.

Scale 6": 1 mile.	Prepared D. B.	Drawn D. B.	FIG. No.
D.S. Sheet NWEST HALF N&W 06 SW	Revised	Date AUG. 1971	

EXPLORATION VENTURES LTD.

TITLE STRICHEN - CRIMOND DISTRICT.
GEOLOGICAL FIELD SHEET.

Scale 6": 1 mile	Prepared D.B.	Drawn D.B.	FIG.No.
O.S. Sheet No. ^{EAST HALF.} NK 06 SW	Revised	Date AUG 1971.	