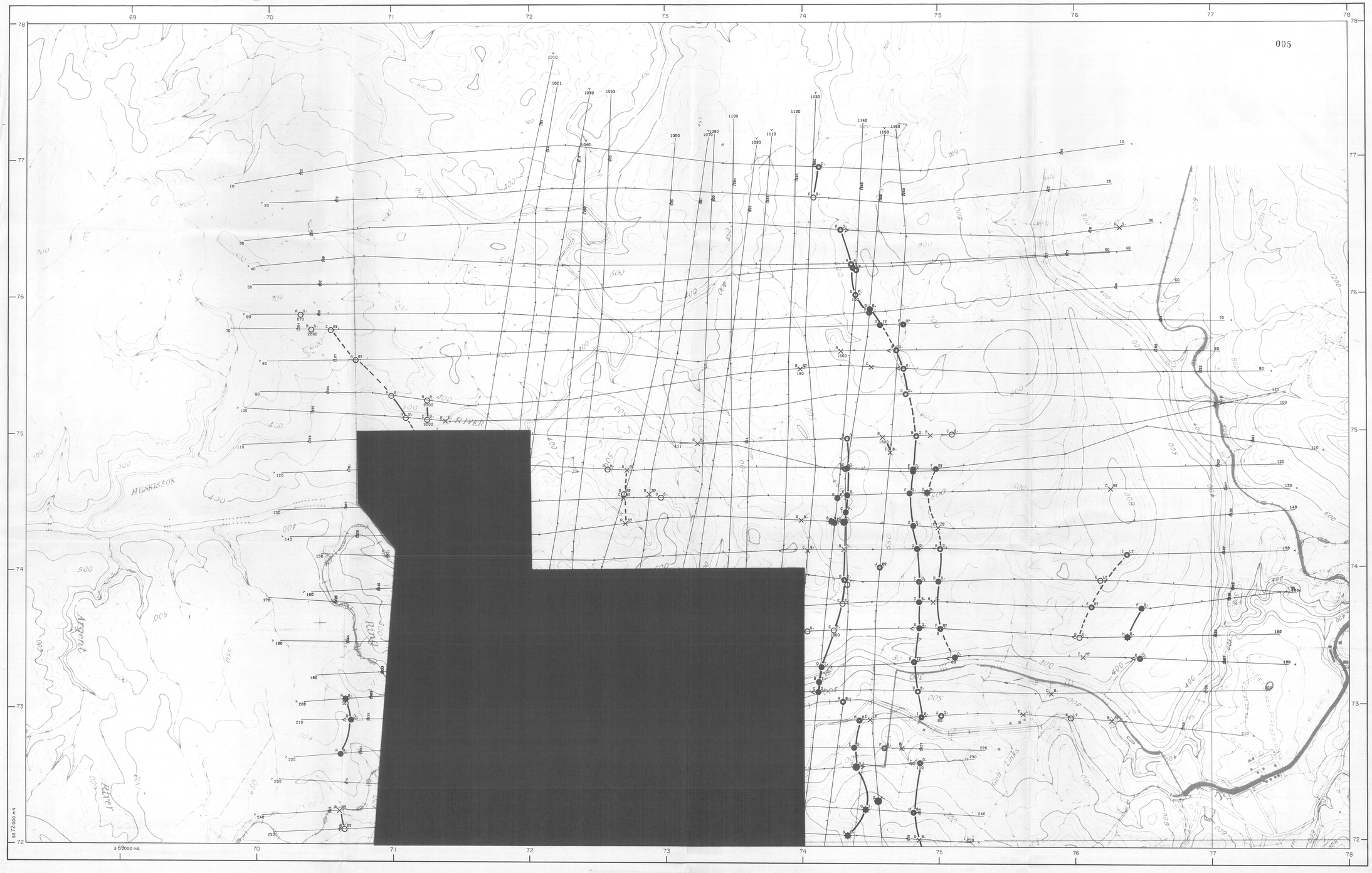


DIGHEM[III] SURVEY

NORTH PIEMAN AREA, TASMANIA

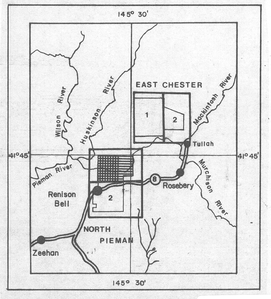
ELECTROMAGNETIC ANOMALIES

FOR

COMSTAFF PTY. LTD.

153087

LOCATION MAP



Scale 1: 500,000

5 cm

85-2414

Scale 1:10,000

1/2 0 1/2 1 Kilometres

1/4 0 1/4 1/2 Miles

5 cm

SHEET 1

Flight Line

Fiducial 2120 (Not recovered from film)
Fiducial 2118 (Recovered from film)
Fiducial 2110 (Not recovered from film)
Fiducial 2104 (Recovered from film)
Line number and Flight direction

[redacted] Area retained by Comstaff Pty. Ltd.

ANOMALY GRADE	EM GRADE SYMBOL	CONDUCTANCE RANGE (MHOS)
6	●	> 99
5	●	50 – 99
4	●	20 – 49
3	●	10 – 19
2	○	5 – 9
1	○	< 5
–	×	Indeterminate

DIGHEM anomalies are divided into six grades of conductivity – thickness product. This product in mhos is the reciprocal of resistance in ohms. The mho is a measure of conductance, and is a geologic parameter.

Above Flight Line / Below Flight Line — Depth is greater than: 30 m, 40 m, 60 m — interpretive symbol (Vertical and Quadrature of Coaxial Coil is greater than: 45 ppm, 15 ppm, 25 ppm)

Refer to list of anomalies in survey report for the actual ppm values for all coils, and for the conductance and depth of conductor.

The interpretation is shown by the interpretive symbol (see legend below) and the letter and number of the anomaly. The horizontal rows of dots indicate anomaly amplitude on the flight record, and the vertical column gives the estimated depth. This depth may be unreliable because the stronger part of the conductor may be deeper or to one side of the flight line, or because of a shallow dip or conductive overburden effects.

SYMBOL	GEOPHYSICAL MODEL	BEDROCK CONDUCTOR		NON-BEDROCK CONDUCTOR		MOST LIKELY
D_1	steeply-dipping thin dike	steeply-dipping planar conductor	sp			
T_1	thick dike	deep conductor, width thickness greater than 10 m	sp	metal culture which contacts conductive ground		discrete bedrock conductor
D_2	indeterminate	bedrock conductor	sp			
P_1	conductor to one side of flight line	flight line passed off the end or side of conductor	sp	flight line passed off the end or side of culture		
E_1	indeterminate	discrete conductor close to a much stronger conductor	sp			
T_2	half space close to surface	conductive rock unit		edge of large conductive zone		
D_3	buried half space	conductive rock unit, "buried" under non-conductive cover or at great depth or large depth extent		deep conductive weathering or thick conductive cover		conductive rock or sediments
				deep conductive weathering or thick conductive cover, "buried" under a dense conductive cover		
R_1	horizontal sheet	sheet bedrock conductor masked by conductive cover	sp	thick conductive cover or occasionally culture which contacts conductive ground		
R_2	horizontal ribbon	flat-lying narrow conductor (sheet conductor pinched)	sp	narrow surface conductor, e.g. stream sediments, or large fenced area		conductive culture
C_1	sphere, horizontal disk	steeply-dipping compact conductor	sp	metal roof or fenced yard		
L_1	line	bedrock conductor masked by culture	sp	fence, pipeline, power line		
X^1						

"X" is one of the above symbols; "sp" means that the correct identification of the geophysical model is only possible by specifying the depth and dip of the conductor.

Anomalies in italics are probable aerodynamic noise, meaning that conductive material may, in fact, not exist.

dip direction
magnetic correlation in nT
conductor axis
flight line

JOB	DATE	DRAWN BY	CHECKED BY
565	JULY 1983	KM	

005

1/2 North Pieman / Electromagnetic Anomalies