

## APPENDIX 2

### SURVEY SPECIFICATIONS FOR IP SURVEY LANGDONS HILL, SE TASMANIA

An IP/Resistivity survey is to be carried out by Zonge Engineering on behalf of Maiden Meadows Pastoral Pty Ltd within their Langdons Hill EL. This is situated about 3kms south of the town of Cygnet in S.E Tasmania.

#### SURVEYING

The grid and lines to be surveyed are shown on the attached figure. The existing grid consists of 13 lines oriented SW-NE across a prominent topographic ridge adjacent to a marine estuary.

For IP, time domain chargeability measurements over a suitable window are preferred but phase is acceptable. Ground resistivities are expected to be high although the proximity of saline water to Grid 2 may mean some loss of current through the ground.

The grid is to be surveyed using 2 gradient arrays as follows:

##### Grid 1

Lines 6100N, 6200N, 6300N, 6400N

Current electrodes at (SW) 505410E, 5217670N; (NE) 506200E, 5218900N

##### Grid 2

Lines 5100N, 5200N, 5300N, 5400N, 5500N, 5600N, 5700N, 5800N, 5900N

Current electrodes at (SW) 505720E, 5217000N; (NE) 506570E, 5218410N

Note that the final positions of the current electrodes are subject to safety and access considerations. Maiden Meadows will locate the current electrode positions prior to the survey and provide precise AMG and local grid coordinates to Zonge. Zonge should advise Luke Vanzino or Rob Read if the current electrode pits are to be dug and prepared before the arrival of the IP crew.

Maiden Meadows will also provide a map showing the grid lines and stations so that Zonge can accurately complete their gradient array resistivity calculations.

#### DIPOLE-DIPOLE SURVEYS

If any interesting responses arise from the Gradient IP survey, Maiden Meadows (through their geophysical consultant) may decide to carry out one or two detailing dipole-dipole lines. These will be surveyed with dipoles of the same spacing as used by the potential electrodes in the gradient IP survey.

Resistivity-depth inversions of the dipole-dipole results may subsequently be required.

## SAFETY

Due to the proximity of houses, cattle, roads, etc. it will be very important to observe strict safety procedures.

Maiden Meadows staff will advise local landowners of the survey and possible hazards, particularly of the current electrode line. It will be necessary to put up warning notices at the current electrodes, the transmitter (if unattended) and wherever the cable crosses or is adjacent to any road. The transmitter should be equipped with an emergency cut-out and all wiring connections should be properly insulated.

If any safety problems arise during the course of the survey, the Zonge crew should immediately advise the Maiden Meadows representative.

## REPORTING

The IP survey results should be emailed at the end of each day to Nigel Hungerford (nigel1@netspace.net.au). Ideally these will be in the form of zipped Geosoft plot files showing apparent resistivity and chargeability or 3 pt phase grids.

A final report will be required listing the main features of the survey (method, line and electrode locations, etc) plus final results plotted as contoured grids (gradient array) or pseudo-sections (dipole-dipole). The basic digital data in the form of an Excel or Geosoft database will also be required.