CSIRO-NTGS McArthur Basin Project: Analysis and interpretation of historical AEM data sets

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Title: CSIRO-NTGS McArthur Basin Project: Analysis and

interpretation of historical AEM data sets

Custodian: Northern Territory Geological Survey (NTGS)

Department of Industry, Tourism and Trade

Abstract: The southern McArthur Basin hosts the McArthur River

and Teena Zn-Pb-Ag deposits and is highly prospective for base metals. This project collated open source AEM

data sets within the Southern McArthur Basin,

documented system characteristics and modelled these

data to produce maps of subsurface conductivity. This Digital Information Package presents results

including:

Individual survey locations in GIS format

Quality controlled AEM data

AEM system characteristics

Transformations of AEM data to CDI products

using EMFlow

Full non-linear inversion of selected AEM data

sets

Search Word(s): Northern Territory, southern McArthur Basin, Barney

Creek Formation, AEM, EMFlow, GALEI, geophysical

inversion

Bounding Coordinates (GDA94

MGA zone 53):

8 370 000 North bounding coordinate:

South bounding coordinate: 7 980 000

East bounding coordinate: 840 000

West bounding coordinate: 490 000

All files are supplied in Geocentric Datum of Australia **Reference System Information:**

(GDA94) Map Grid of Australia zone 53 projected co-

ordinates [EPSG: 28353].

Data Currency Start Date: 1992

Data Currency End Date: June 2021 **Progress:** Complete **Maintenance and Update**

Frequency:

As required

Access Constraint:

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Input datasets and processing are outlined in the accompanying report: Mulè SG et al. (2021) CSIRO NTGS McArthur Basin Project: Analysis and interpretation of historical AEM datasets. *CSIRO*, *Australia*. *Report* EP207524.

Input data are of varying age and quality. Further detail is provided in the accompanying report.

Attribute accuracy is high, accurately reflecting the input data.

Lineage:

Positional Accuracy:

Attribute Accuracy:

Logical Consistency: Data is logically consistent within the scope of the

project.

Completeness: Data is complete within the scope of this project.

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