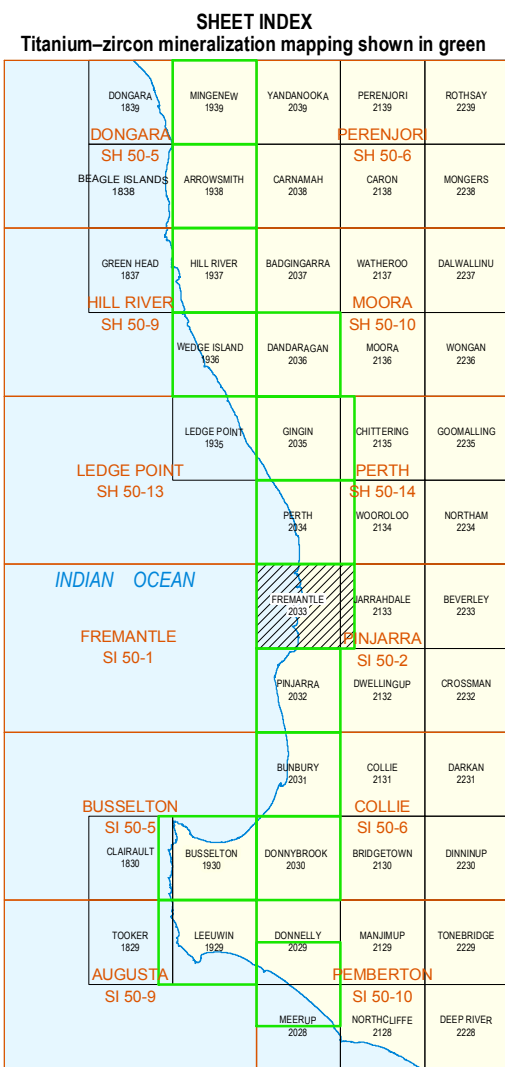


- Strategic mineral resource protection area; should be set aside for future mining
- 500m separation area around strategic mineral resource protection area; land use options may be restricted
- Possible strategic resource area that may contain mineral deposits; land use options may be restricted in parts of these areas
- Sterilized mineral deposit currently unlikely to be mined; does not restrict land use options

Mundijong Generalized deposit name

- Land title boundary, simplified
- Highway / major road
- Rail
- Airfield
- Local government area boundary
- Drainage

NOTE: this map shows the extent of known titanium-zircon mineralization, surrounded by an infrastructure halo. The extent of mineralization is based on exploration only up to the date of publication. Future exploration may locate additional areas of mineralization.



1 : 100 000 maps shown in black  
1 : 250 000 maps shown in brown  
Search for current GSWA map products online ([www.dmp.wa.gov.au/bookings](http://www.dmp.wa.gov.au/bookings))

DATA DIRECTORY

Theme	Data Source	Data Currency	Organization
Cadastre	Landgate	Apr 2009	Landgate
Topographic nomenclature	GEOGNOMA	2009	Landgate
Topography	Landgate	2009	Landgate
Land use planning areas	GSWA	2009	Dept of Mines and Petroleum

\* GSWA and DMP databases can be viewed online ([www.dmp.wa.gov.au/goview](http://www.dmp.wa.gov.au/goview)) or can be downloaded from the GSWA Data and Software Centre ([www.dmp.wa.gov.au/dsc](http://www.dmp.wa.gov.au/dsc))

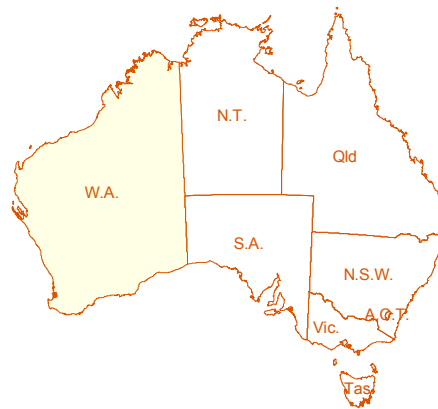
Compiled by LY Hassan 2009, based on first edition by MJ Freeman 2006, and additional data supplied by companies.

Cartography by I Lesiak

Published by the Geological Survey of Western Australia. Digital and hard copies of this map are available from the Information Centre, Department of Mines and Petroleum, 100 Plain Street, East Perth, WA 6004. Phone (08) 5222 2450. Fax (08) 5222 3444

Website: [www.dmp.wa.gov.au](http://www.dmp.wa.gov.au) Email: [geological\\_survey@dmp.wa.gov.au](mailto:geological_survey@dmp.wa.gov.au)

The recommended reference for this map is: Hassan, LY 2009. Titanium-zircon mineralization, Fremantle-Jarrahdale. Resource potential for land use planning (1:100 000 scale). Geological Survey of Western Australia.



Government of Western Australia  
Department of Mines and Petroleum

Geological Survey of  
Western Australia



TM GRIFFIN  
EXECUTIVE DIRECTOR

Scale 1:100 000  
1000 0 1 2 3 4 5 6 7 8 9 10  
Metres Kilometres

UNIVERSAL TRANSVERSE MERCATOR PROJECTION  
HORIZONTAL DATUM: GEODESIC DATUM OF AUSTRALIA 1994

Grid lines indicate 10 000 metre interval of the Map Grid Australia Zone 50

The Map Grid Australia (MGA) is based on the Geocentric Datum of Australia 1994 (GDA94)  
GDA94 positions are compatible within one metre of the datum WGS84 positions



GEOLOGICAL SURVEY OF WESTERN AUSTRALIA  
RESOURCE POTENTIAL FOR LAND USE PLANNING  
TITANIUM-ZIRCON MINERALIZATION  
FREMANTLE-JARRAHDAL

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