# Well correlations, Phanerozoic and Neoproterozoic basins of Western Australia

by

DM Brooks and F Irimies

# Abstract

The Energy Systems Atlas is a collection of new geological map layers designed to help explorers identify each of the essential elements and processes of a petroleum system: source, reservoir, seal, burial, maturation, stratigraphic framework, structure, trap formation and migration. To help assess basin stratigraphy, published well correlations within the Phanerozoic basins of Western Australia have been compiled from new and legacy Geological Survey of Western Australia (GSWA) publications. These correlations are original GSWA interpretations of wireline logs, lithology and biostratigraphy from petroleum and mineral well intersections and outcrop. Well correlations have been compiled from various interpretation reports covering the majority of Western Australian sedimentary basins. New correlations will be added as new stratigraphic interpretation campaigns conclude.

The geology and a description of the data and methods of all well correlations are outlined in the original GSWA publications, which are given in the attribute tables of each correlation in the Energy Systems Atlas. GSWA publications are available from the <u>DMIRS eBookshop</u>. Legacy correlations do not show updates since the year of publication and do not incorporate newer well data. Unless otherwise stated, depth axes are given as metres below sea level and are positive downwards, and distance between wells are given as kilometres or without scale in cases where the well templates are evenly spaced.

## How to access

The **Energy Systems Atlas** is best accessed using the Western Australian Petroleum and Geothermal Information Management System (<u>WAPIMS</u>). This online interactive mapping system allows data to be viewed and searched together with other datasets. The Energy Systems Atlas well correlations are also available as a data package on request from WAPIMS/requests form.

### **Recommended reference**

Brooks, DM and Irimies, F 2021, Well correlations, Phanerozoic and Neoproterozoic basins of Western Australia: Geological Survey of Western Australia, digital dataset, <<u>www.dmirs.wa.gov.au/wapims</u>>.

#### Disclaimer

This product uses information from various sources. The Department of Mines, Industry Regulation and Safety (DMIRS) and the State cannot guarantee the accuracy, currency or completeness of the information. Neither the department nor the State of Western Australia nor any employee or agent of the department shall be responsible or liable for any loss, damage or injury arising from the use of or reliance on any information, data or advice (including incomplete, out of date, incorrect, inaccurate or misleading information, data or advice) expressed or implied in, or coming from, this publication or incorporated into it by reference, by any person whosoever.

#### © State of Western Australia (Department of Mines, Industry Regulation and Safety) 2021

With the exception of the Western Australian Coat of Arms and other logos, and where otherwise noted, these data are provided under a Creative Commons Attribution 4.0 International Licence. (http://creativecommons.org/licenses/by/4.0/legalcode)