

ISO Geodetic Registry

| | | |
|---------------------------|--|--|
| <i>Item class</i> | GeodeticCRS | |
| <i>Name</i> | GDA94 - LatLonEHt | |
| <i>Item status</i> | VALID | |
| <i>Identifier</i> | 288 | |
| <i>Alias</i> | GDA94 | |
| <i>Information source</i> | <i>Title</i> | Geocentric Datum of Australia Technical Manual Version 2.4 |
| | <i>Author</i> | Permanent Committee on Geodesy of the Intergovernmental Committee on Surveying and Mapping |
| | <i>Publisher</i> | Intergovernmental Committee on Surveying and Mapping |
| | <i>Publication date</i> | 2014-12-02 |
| | <i>Edition date</i> | |
| <i>Data source</i> | ISO Geodetic Registry | |
| <i>Scope</i> | Spatial referencing. | |
| <i>Datum</i> | Geocentric Datum of Australia 1994 | |
| <i>Coordinate System</i> | Ellipsoidal 3D CS. Axes: latitude, longitude, ellipsoidal height. Orientations: north, east, up. UoM: degree, degree, metre. | |

Extent

| | | |
|--------------------------------|--|--------|
| <i>Description</i> | Australia - onshore and offshore - mainland, Tasmania, Lord Howe Island, Norfolk Island, Macquarie Island. Christmas Island - onshore and offshore. Cocos (Keeling) Islands - onshore and offshore. | |
| <i>Geographic Bounding Box</i> | <i>West-bound longitude</i> | 93.41 |
| | <i>North-bound latitude</i> | -8.47 |
| | <i>East-bound longitude</i> | 173.4 |
| | <i>South-bound latitude</i> | -60.56 |

ISO Geodetic Registry

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|-----------------------------------|---|--|
| <i>Item class</i> | GeodeticDatum | |
| <i>Name</i> | Geocentric Datum of Australia 1994 | |
| <i>Item status</i> | VALID | |
| <i>Identifier</i> | 182 | |
| <i>Alias</i> | GDA94 | |
| <i>Information source</i> | <i>Title</i> | Geocentric Datum of Australia Technical Manual Version 2.4 |
| | <i>Author</i> | Permanent Committee on Geodesy of the Intergovernmental Committee on Surveying and Mapping |
| | <i>Publisher</i> | Intergovernmental Committee on Surveying and Mapping |
| | <i>Publication date</i> | 2014-12-02 |
| | <i>Edition date</i> | |
| <i>Data source</i> | ISO Geodetic Registry | |
| <i>Remarks</i> | Replaces AGD84 except for the Australian Capital Territory. | |
| <i>Anchor definition</i> | ITRF92 at epoch 1994.0. | |
| <i>Release date</i> | 1998-01-14 | |
| <i>Coordinate Reference Epoch</i> | 1994.0 | |
| <i>Scope</i> | Spatial referencing | |
| <i>Ellipsoid</i> | GRS 1980 | |
| <i>Prime Meridian</i> | Greenwich | |

Extent

| | | |
|--------------------------------|--|--------|
| <i>Description</i> | Australia - onshore and offshore - mainland, Tasmania, Lord Howe Island, Norfolk Island, Macquarie Island. Christmas Island - onshore and offshore. Cocos (Keeling) Islands - onshore and offshore. | |
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|-----------------------------|--|--------------|--------------------------------|---------------|-----------|------------------|--------------------------------------|-------------------------|---------|----------------------------|---------------------|-----------------------------|------------------|-------------|---------|
| <i>Item class</i> | Ellipsoid | | | | | | | | | | | | | | |
| <i>Name</i> | GRS 1980 | | | | | | | | | | | | | | |
| <i>Item status</i> | VALID | | | | | | | | | | | | | | |
| <i>Identifier</i> | 27 | | | | | | | | | | | | | | |
| <i>Alias</i> | Geodetic Reference System 1980 | | | | | | | | | | | | | | |
| <i>Alias</i> | GRS1980 | | | | | | | | | | | | | | |
| <i>Alias</i> | IAG GRS80 | | | | | | | | | | | | | | |
| <i>Alias</i> | International 1979 | | | | | | | | | | | | | | |
| <i>Alias</i> | GRS80 | | | | | | | | | | | | | | |
| <i>Information source</i> | <table> <tr> <td><i>Title</i></td><td>Geodetic Reference System 1980</td></tr> <tr> <td><i>Author</i></td><td>H. Moritz</td></tr> <tr> <td><i>Publisher</i></td><td>Springer International Publishing</td></tr> <tr> <td><i>Publication date</i></td><td>2003-03</td></tr> <tr> <td><i>Series/Journal name</i></td><td>Journal of Geodesy</td></tr> <tr> <td><i>Issue identification</i></td><td>Volume 74, No. 1</td></tr> <tr> <td><i>Page</i></td><td>128–162</td></tr> </table> | <i>Title</i> | Geodetic Reference System 1980 | <i>Author</i> | H. Moritz | <i>Publisher</i> | Springer International Publishing | <i>Publication date</i> | 2003-03 | <i>Series/Journal name</i> | Journal of Geodesy | <i>Issue identification</i> | Volume 74, No. 1 | <i>Page</i> | 128–162 |
| <i>Title</i> | Geodetic Reference System 1980 | | | | | | | | | | | | | | |
| <i>Author</i> | H. Moritz | | | | | | | | | | | | | | |
| <i>Publisher</i> | Springer International Publishing | | | | | | | | | | | | | | |
| <i>Publication date</i> | 2003-03 | | | | | | | | | | | | | | |
| <i>Series/Journal name</i> | Journal of Geodesy | | | | | | | | | | | | | | |
| <i>Issue identification</i> | Volume 74, No. 1 | | | | | | | | | | | | | | |
| <i>Page</i> | 128–162 | | | | | | | | | | | | | | |
| <i>Information source</i> | <table> <tr> <td><i>Title</i></td><td>Geodetic Reference System 1980</td></tr> <tr> <td><i>Author</i></td><td>H. Moritz</td></tr> <tr> <td><i>Publisher</i></td><td>International Association of Geodesy</td></tr> <tr> <td><i>Publication date</i></td><td>1984</td></tr> <tr> <td><i>Series/Journal name</i></td><td>Bulletin Geodesique</td></tr> <tr> <td><i>Issue identification</i></td><td>Volume 58, No. 3</td></tr> <tr> <td><i>Page</i></td><td>395-405</td></tr> </table> | <i>Title</i> | Geodetic Reference System 1980 | <i>Author</i> | H. Moritz | <i>Publisher</i> | International Association of Geodesy | <i>Publication date</i> | 1984 | <i>Series/Journal name</i> | Bulletin Geodesique | <i>Issue identification</i> | Volume 58, No. 3 | <i>Page</i> | 395-405 |
| <i>Title</i> | Geodetic Reference System 1980 | | | | | | | | | | | | | | |
| <i>Author</i> | H. Moritz | | | | | | | | | | | | | | |
| <i>Publisher</i> | International Association of Geodesy | | | | | | | | | | | | | | |
| <i>Publication date</i> | 1984 | | | | | | | | | | | | | | |
| <i>Series/Journal name</i> | Bulletin Geodesique | | | | | | | | | | | | | | |
| <i>Issue identification</i> | Volume 58, No. 3 | | | | | | | | | | | | | | |
| <i>Page</i> | 395-405 | | | | | | | | | | | | | | |
| <i>Data source</i> | ISO Geodetic Registry | | | | | | | | | | | | | | |
| <i>Remarks</i> | Adopted by IUGG 1979 Canberra. Inverse flattening is derived from geocentric gravitational constant $GM = 3986005e8 \text{ m}^3/\text{s}^2$, dynamic form factor $J_2 = 108263e-8$ and Earth's angular velocity = $7292115e-11 \text{ rad/s}$. | | | | | | | | | | | | | | |
| <i>Semi-major axis</i> | 6378137.0 m | | | | | | | | | | | | | | |
| <i>Inverse flattening</i> | 298.257222101 m | | | | | | | | | | | | | | |

ISO Geodetic Registry

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|----------------------------|-------------------------------|---|
| <i>Item class</i> | PrimeMeridian | |
| <i>Name</i> | Greenwich | |
| <i>Item status</i> | VALID | |
| <i>Identifier</i> | 25 | |
| <i>Alias</i> | Zero meridian | |
| <i>Information source</i> | <i>Title</i> | Why the Greenwich meridian moved |
| | <i>Author</i> | S. Malys, J.H. Seago, N.K. Pavlis, P.K. Seidelmann, G.H. Kaplan |
| | <i>Publisher</i> | Springer International Publishing |
| | <i>Publication date</i> | 2015-12 |
| | <i>Series/Journal name</i> | Journal of Geodesy |
| | <i>Issue identification</i> | Volume 89, No. 12 |
| | <i>Page</i> | 1263–1272 |
| <i>Information source</i> | <i>Title</i> | IERS Conventions (2010) |
| | <i>Author</i> | G. Petit, B.J. Luzum (eds) |
| | <i>Publisher</i> | Verlag des Bundesamts für Kartographie und Geodäsie |
| | <i>Publication date</i> | 2010 |
| | <i>Edition date</i> | |
| | <i>Series/Journal name</i> | IERS Technical Notes |
| | <i>Issue identification</i> | 36.0 |
| <i>Data source</i> | <i>Other citation details</i> | ISSN: 1019-4568 |
| | ISO Geodetic Registry | |
| <i>Greenwich longitude</i> | 0.0 ° | |

ISO Geodetic Registry

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|---------------------------|--|---|
| <i>Item class</i> | EllipsoidalCS | |
| <i>Name</i> | Ellipsoidal 3D CS. Axes: latitude, longitude, ellipsoidal height. Orientations: north, east, up. UoM: degree, degree, metre. | |
| <i>Item status</i> | VALID | |
| <i>Identifier</i> | 46 | |
| <i>Information source</i> | <i>Title</i> | ISO 19111 Geographical information - Spatial referencing by coordinates |
| | <i>Author</i> | International Organization for Standardization (ISO) |
| | <i>Publisher</i> | International Organization for Standardization (ISO) |
| | <i>Publication date</i> | 2007-07-01 |
| | <i>Edition</i> | Second Edition |
| | <i>Series/Journal name</i> | International Standard |
| | <i>Issue identification</i> | ISO 19111:2007 |
| <i>Data source</i> | ISO Geodetic Registry | |
| <i>Remarks</i> | Used in geographic 3D coordinate reference systems. Horizontal coordinates referenced to this CS are in degrees. Any degree representation (e.g. DMSH, decimal, etc.) may be used but that used must be declared for the user. | |

Axes

| | | |
|---------------------------|---|---|
| <i>Item class</i> | CoordinateSystemAxis | |
| <i>Name</i> | Geodetic latitude | |
| <i>Item status</i> | VALID | |
| <i>Identifier</i> | 38 | |
| <i>Information source</i> | <i>Title</i> | ISO 19111 Geographical information - Spatial referencing by coordinates |
| | <i>Author</i> | International Organization for Standardization (ISO) |
| | <i>Publisher</i> | International Organization for Standardization (ISO) |
| | <i>Publication date</i> | 2007-07-01 |
| | <i>Edition</i> | Second Edition |
| | <i>Series/Journal name</i> | International Standard |
| | <i>Issue identification</i> | ISO 19111:2007 |
| <i>Data source</i> | ISO Geodetic Registry | |
| <i>Remarks</i> | Used in geographic 2D and geographic 3D coordinate reference systems. | |
| <i>Abbreviation</i> | Lat | |
| <i>Direction</i> | north | |
| <i>Unit</i> | degree (supplier to define representation) | |

| | | |
|---------------------------|---------------------------|---|
| <i>Item class</i> | CoordinateSystemAxis | |
| <i>Name</i> | Geodetic longitude | |
| <i>Item status</i> | VALID | |
| <i>Identifier</i> | 34 | |
| <i>Information source</i> | <i>Title</i> | ISO 19111 Geographical information - Spatial referencing by coordinates |
| | <i>Author</i> | International Organization for Standardization (ISO) |

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| | <i>Publisher</i> | International Organization for Standardization (ISO) |
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| | <i>Series/Journal name</i> | International Standard |
| | <i>Issue identification</i> | ISO 19111:2007 |
| <i>Data source</i> | ISO Geodetic Registry | |
| <i>Remarks</i> | Used in geographic 2D and geographic 3D coordinate reference systems. | |
| <i>Abbreviation</i> | Lon | |
| <i>Direction</i> | east | |
| <i>Unit</i> | degree (supplier to define representation) | |

| | | |
|---------------------------|--|---|
| <i>Item class</i> | CoordinateSystemAxis | |
| <i>Name</i> | Ellipsoidal height | |
| <i>Item status</i> | VALID | |
| <i>Identifier</i> | 36 | |
| <i>Information source</i> | <i>Title</i> | ISO 19111 Geographical information - Spatial referencing by coordinates |
| | <i>Author</i> | International Organization for Standardization (ISO) |
| | <i>Publisher</i> | International Organization for Standardization (ISO) |
| | <i>Publication date</i> | 2007-07-01 |
| | <i>Edition</i> | Second Edition |
| | <i>Series/Journal name</i> | International Standard |
| | <i>Issue identification</i> | ISO 19111:2007 |
| <i>Data source</i> | ISO Geodetic Registry | |
| <i>Remarks</i> | Used only as part of an ellipsoidal 3D coordinate system in a geographic 3D coordinate reference system, never on its own. | |
| <i>Abbreviation</i> | h | |
| <i>Direction</i> | up | |
| <i>Unit</i> | metre | |