

# ISO Geodetic Registry

<i>Item class</i>	GeodeticDatum	
<i>Name</i>	<b>Korean 1985 Datum</b>	
<i>Item status</i>	VALID	
<i>Identifier</i>	1004	
<i>Information source</i>	<i>Title</i>	Korean origin of longitude and latitude
	<i>Author</i>	Geodesy Department, NGII
	<i>Publisher</i>	National Geographic Information Institute (NGII), Ministry of Construction and Transportation, Republic of Korea
	<i>Revision date</i>	2018-05
	<i>Other citation details</i>	Web page in Korean, accessible only within Korea. <a href="https://www.ngii.go.kr/kor/content.do?sq=189#none">https://www.ngii.go.kr/kor/content.do?sq=189#none</a> (accessed 2023-06-01)
<i>Information source</i>	<i>Title</i>	Grids & Datums: The Republic of Korea
	<i>Author</i>	C.J. Mugnier
	<i>Publisher</i>	American Society for Photogrammetry and Remote Sensing
	<i>Publication date</i>	2017
	<i>Series/Journal name</i>	Photogrammetric Engineering & Remote Sensing
	<i>Issue identification</i>	Volume 83, No. 8, August 2017
	<i>Page</i>	537-539
<i>Information source</i>	<i>Other citation details</i>	<a href="https://doi.org/10.14358/PERS.83.8.539">https://doi.org/10.14358/PERS.83.8.539</a> (accessed 2023-04-10)
	<i>Title</i>	Korea Geodetic Framework for Sustainable Development
	<i>Author</i>	J.-H. Kwon
	<i>Publisher</i>	United Nations Economic and Social Council
	<i>Publication date</i>	2012
	<i>Series/Journal name</i>	Nineteenth United Nations Regional Cartographic Conference for Asia and the Pacific, Bangkok, 29 October – 1 November 2012
	<i>Issue identification</i>	E/CONF.102/IP.17
<i>Information source</i>	<i>Other citation details</i>	<a href="https://unstats.un.org/unsd/geoinfo/rcc/docs/rccap19/ip/E_Conf.102_IP17_Korea_19th_UNRCC-AP_Session3_26%20Oct.pdf">https://unstats.un.org/unsd/ geoinfo/rcc/docs/rccap19/ip/ E_Conf.102_IP17_Korea_19th_UNRCC- AP_Session3_26%20Oct.pdf</a> (accessed 2023-04-10)
	<i>Data source</i>	ISO Geodetic Registry
	<i>Remarks</i>	Replaced by KGD2002
	<i>Anchor definition</i>	Korean 1985 Datum is the first Korean Triangulation Network based on the Bessel 1841 ellipsoid. Approximately 7,000 points had been observed with EDM and TRANSIT since 1975, and adjusted through two campaigns by NGII. The origin of the datum was observed and determined by astronomical surveying over 4 years (1981 - 1985).
	<i>Release date</i>	1985.0
<i>Scope</i>	Spatial referencing	
<i>Ellipsoid</i>	Bessel 1841	
<i>Prime Meridian</i>	Greenwich	

## Extent

<i>Description</i>	<b>Republic of Korea - onshore and offshore</b>
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<i>Item class</i>	Ellipsoid
<i>Name</i>	<b>Bessel 1841</b>
<i>Item status</i>	VALID
<i>Identifier</i>	996
<i>Alias</i>	Bessel
<i>Information source</i>	<p><i>Title</i> The Universal Grids and the Transverse Mercator and Polar Stereographic Map Projections</p> <p><i>Author</i> National Geospatial-Intelligence Agency</p> <p><i>Publisher</i> Office of Geomatics, National Geospatial-Intelligence Agency</p> <p><i>Revision date</i> 2014-03-25</p> <p><i>Edition</i> Version 2.0.0</p> <p><i>Series/Journal name</i> National Geospatial-Intelligence Agency Standardization Document</p> <p><i>Issue identification</i> NGA.SIG.0012_2.0.0_UTMUPS</p>
<i>Information source</i>	<p><i>Title</i> Ueber einen Fehler in der Berechnung der französischen Gradmessung und seinen Einfluss auf die Bestimmung der Figur der Erde</p> <p><i>Author</i> F.W. Bessel</p> <p><i>Publication date</i> 1841-12-01</p> <p><i>Series/Journal name</i> Astronomische Nachrichten (Astronomical Notes)</p> <p><i>Issue identification</i> Volumes 19, Issue 7-8, No. 438</p> <p><i>Page</i> 97-116</p> <p><i>Other citation details</i> <a href="https://doi.org/10.1002/asna.18420190702">https://doi.org/10.1002/asna.18420190702</a> (accessed 2023-04-10)</p>
<i>Data source</i>	ISO Geodetic Registry
<i>Remarks</i>	The Bessel ellipsoid was derived in 1841 by Friedrich Wilhelm Bessel, based on several meridian arcs and other data of continental geodetic networks of Europe, Russia and the British Survey of India. It is based on 10 meridional arcs and 38 precise measurements of astrogeodetic latitude and longitude. The dimensions of the ellipsoid axes were defined by logarithms in keeping with former calculation methods. The original axes were defined as $a=3272077.14$ and $b=3261139.33$ toise. This was based a weighted mean of values from several authors but did not account for differences in the length of the various toise. The "Bessel toise" is therefore of uncertain length.
<i>Semi-major axis</i>	6377397.155 m
<i>Inverse flattening</i>	299.1528128 m

# ISO Geodetic Registry

<i>Item class</i>	PrimeMeridian	
<i>Name</i>	<b>Greenwich</b>	
<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 °	