## **Resource Summary Report**

Generated by dkNET on Apr 27, 2025

# **Computational Infrastructure for Geodynamics**

RRID:SCR\_003371

Type: Tool

## **Proper Citation**

Computational Infrastructure for Geodynamics (RRID:SCR\_003371)

#### **Resource Information**

URL: http://geodynamics.org/

**Proper Citation:** Computational Infrastructure for Geodynamics (RRID:SCR\_003371)

**Description:** Community-driven organization that develops and disseminates software for geophysics and related fields. They host codes in a wide range of disciplines in geodynamics and computational science including geodynamo, long-term tectonics, magma migration, mantle dynamics, seismology, and short-term crustal dynamics.

Abbreviations: CIG

**Synonyms:** Computational Infrastructure for Geodynamics (CIG)

Resource Type: data or information resource, group, portal

**Keywords:** geophysics, modeling, computation, computational science, geodynamo, long-term tectonics, magma migration, mantle dynamics, seismology, short term crustal dynamics

Funding: NSF 094946

Availability: Acknowledgement requested, Open-source license, Refer to each for individual

license, The community can contribute to this resource

Resource Name: Computational Infrastructure for Geodynamics

Resource ID: SCR 003371

Alternate IDs: SciRes\_000182

License: GNU General Public License, BSD, CeCILL version 2, MIT

**Record Creation Time:** 20220129T080218+0000

**Record Last Update:** 20250426T055621+0000

### **Ratings and Alerts**

No rating or validation information has been found for Computational Infrastructure for Geodynamics.

No alerts have been found for Computational Infrastructure for Geodynamics.

#### Data and Source Information

Source: SciCrunch Registry

## **Usage and Citation Metrics**

We found 10 mentions in open access literature.

**Listed below are recent publications.** The full list is available at <u>dkNET</u>.

Wu R, et al. (2024) Influence of different factors on coseismic deformation of the 2015 Mw7.8 earthquake in Nepal. Scientific reports, 14(1), 9613.

Cao Z, et al. (2024) Western US intraplate deformation controlled by the complex lithospheric structure. Nature communications, 15(1), 3917.

Xie S, et al. (2024) The role of plume-lithosphere interaction in Hawaii-Emperor chain formation. Nature communications, 15(1), 6571.

Gernon TM, et al. (2024) Coevolution of craton margins and interiors during continental break-up. Nature, 632(8024), 327.

Wu X, et al. (2023) Paleogene India-Eurasia collision constrained by observed plate rotation. Nature communications, 14(1), 7272.

Jones MJ, et al. (2022) A South Pole-Aitken impact origin of the lunar compositional asymmetry. Science advances, 8(14), eabm8475.

Hu J, et al. (2021) Southward expanding plate coupling due to variation in sediment subduction as a cause of Andean growth. Nature communications, 12(1), 7271.

Borgeaud AFE, et al. (2017) Imaging paleoslabs in the D? layer beneath Central America and the Caribbean using seismic waveform inversion. Science advances, 3(11), e1602700.

Austermann J, et al. (2017) Detection of a dynamic topography signal in last interglacial sealevel records. Science advances, 3(7), e1700457.

Harms J, et al. (2015) Terrestrial Gravity Fluctuations. Living reviews in relativity, 18(1), 3.