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Combination Service for Time-variable Gravity Fields (COST-G): operational GRACE-FO combination and validation of Chinese GRACE time-series

Ulrich Meyer[1], Martin Lasser[1], Adrian Jäggi[1], Christoph Dahle[2], Frank Flechtner[2], Andreas Kvas[3], Saniya Behzadpour[3], Torsten Mayer-Gürr[3], Jean-Michel Lemoine[4], Igor Koch[5], Jakob Flury[5], Stephane Bourgogne[6], Andreas Groh[7], Annette Eicker[8], Christoph Förste[2], Zhicai Luo[10], Jiangjun Ran[11], Yunzhong Shen[12], Qile Zhao[13], Wei Feng[14,15], and the COST-G Team[*]

[1]University of Bern, Astronomical Institute, Bern, Switzerland (ulrich.meyer@aiub.unibe.ch)
[2]GFZ German Research Centre for Geosciences, Germany
[3]Graz University of Technology, Austria
[4]Centre National d'Etudes Spatiales, France
[5]Leibniz University Hannover, Germany
[6]Stellar Space Studies, France
[7]Institute of planetary geodesy, Technical University of Dresden, Germany
[8]HafenCity University Hamburg, Germany
[10]Institute of Geophysics, School of Physics, Huazhong University of Science and Technology, China
[11]Department of Earth and Space Sciences, Southern University of Science and Technology, China
[12]College of Surveying and Geo-informatics, Tongji University, Shanghai, China
[13]GNSS Research Center, Wuhan University, China
[14]Institute of Geodesy and Geophysics, Innovation Academy for Precision Measurement Science and Technology, Chinese Academy of Sciences, China
[15]School of Geospatial Engineering and Science, Sun Yat-sen University, China
[*]A full list of authors appears at the end of the abstract

The Combination Service for Time-variable Gravity Fields (COST-G) of the International Association of Geodesy (IAG) provides combined monthly gravity fields of its associated and partner Analysis Centers (ACs). In November 2020, the combination of monthly GRACE-FO gravity fields started its operational mode, providing consolidated L2 (spherical harmonics) and L3 (gridded and post-processed) products with a latency of currently 3 months. We present an overview and quality assessment of the available products.

COST-G aims at the extension of its service to include further GRACE and GRACE-FO analysis centers. In January 2020 a collaboration with representatives of five Chinese ACs was initiated, who provided GRACE time-series according to the COST-G requirements. We present the results of a test combination with the Chinese AC models, including comparison and quality assessment of all contributing time-series and validation of the combined gravity fields.

COST-G Team: Ulrich Meyer, Martin Lasser, Adrian Ja□ggi: University of Bern, Astronomical Institute, Bern, Switzerland; Frank Flechtner, Christoph Dahle, Christoph Förste: GFZ German Research Centre for Geosciences, Germany; Torsten Mayer- Gu□rr, Andreas Kvas, Saniya Behzadpour: Graz University of Technology, Austria; Jean-Michel Lemoine: Centre National d'Etudes Spatiales, France; Igor Koch, Jakob Flury: Leibniz University Hannover, Germany; Stéphane Bourgogne: Stellar Space Studies, France; Andreas Groh: Institute of planetary geodesy, Technical University of Dresden, Germany; Annette Eicker: HafenCity University Hamburg, Germany; Benoit Meyssignac: Laboratoire d'Etudes en Geophysique et Oceanographie Spatiales, France; Hao Zhou, Zhicai Luo: Institute of Geophysics, School of Physics, Huazhong University of Science and Technology, China; Zhengwen Yan, Jiangjun Ran: Department of Earth and Space Sciences, Southern University of Science and Technology, China; Qiujie Chen, Yunzhong Shen: College of Surveying and Geo-informatics, Tongji University, Shanghai, China; Xiang Guo, Qile Zhao: GNSS Research Center, Wuhan University, China; Changqing Wang, Min Zhong: Institute of Geodesy and Geophysics, Innovation Academy for Precision Measurement Science and Technology, Chinese Academy of Sciences, China; Wei Feng: Institute of Geodesy and Geophysics, Innovation Academy for Precision Measurement Science and Technology, Chinese Academy of Sciences, and China School of Geospatial Engineering and Science, Sun Yat-sen University, China