

# News at a Glance

- 1. IGCC requests bids to host 38th IGC
- 2. IUGS@60 News
- 3. Invitation for position of Associate Editors for Episodes
- 4. Deep-time Digital Earth (DDE) Forum
- 5. News from the International Commission on Stratigraphy (ICS): STRATI 2023
- 6. The new IUGS task force on diversity, equity and inclusion
- 7. News from IFG
- 8. News from INHIGEO
- 9. News from the Commission on Global Geochemical Baselines
- 10. News from IUGS TecTask
- 11. International Geoscience and Geoparks programme Summer 2022 newsletter

# 1. IGCC requests bids to host 38th IGC

The International Geological Congress Committee (IGCC) opens the Call for Bids to Host the 38th International Geological Congress in 2028. The Call for Bids to Host the 38th International Geological Congress in 2028 can be downloaded through <u>https://www.iugs.org/\_files/ugd/f1fc07\_c3626c4426e74e208fa0b396732b1cbf.pdf?index=true</u> and Guidelines for Preparation of Bid Documents to Host the 38th IGC can be downloaded through <u>https://www.iugs.org/\_files/ugd/f1fc07\_e681515db7e444e3a1e9e4a5ec675444.pdf?index=true</u>

# 2. IUGS@60 News

a. IUGS60newsletter: Message from the President John Ludden

The International Union of Geological Sciences (IUGS) is celebrating the IUGS's 60th Anniversary this year. The IUGS@60 team have been busy helping us deliver a number of anniversary events already this year and we have a number of very ambitious and exciting International Events happening later on in the Autumn. We have put together a one-off newsletter to showcase these festivities and plans for the rest of 2022, which we would love you to be involved in. We are really keen to strengthen our bonds with our affiliates and members and work closely together to engage society in finding solutions to very real environmental challenges facing us all today and in the future. At the bottom of the newsletter, there is some information about one of the proposed events, where we would love to bring the geoscience community together and are thus keen to hear from you if you would like to take part.

We thank you for all your support over the years and hope the next 60 for us will be filled with your good company and together we can help build a fairer and more sustainable future for all.

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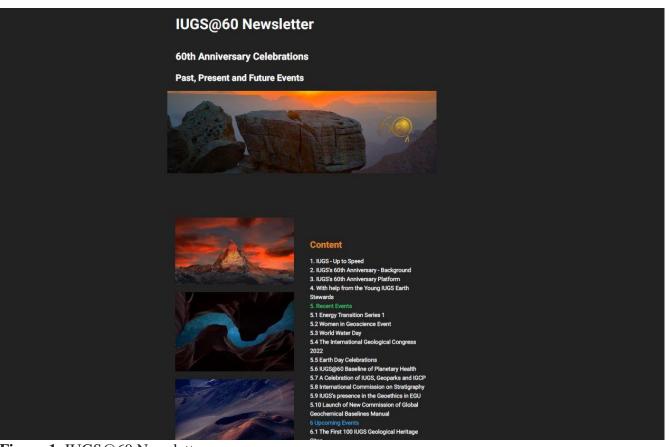


Figure 1. IUGS@60 Newsletter

To download the IUGS@60 Newsletter click the link below: https://iugs60.org/wp-content/uploads/2022/07/IUGS\_at60\_Newsletter.pdf

If you like our IUGS@60 activities and want to be kept in the loop, please subscribe to the newsletter: <u>https://iugs60.org/subscribe/</u>

b. During its main 60th anniversary celebration, the IUGS is pleased to present "**The First 100 IUGS Geological Heritage Sites**" at an event in Zumaia, Basque Coast UGGp (Spain) during the last week of October 2022. This announcement will kick off an endeavor to designate geological sites from around the world that are iconic, recognized by all geoscience community for their impact in understanding the Earth and its history. More than 200 specialists from almost 40 nations and ten international organizations are taking part in this challenging project.

The First 100 aspires to be a memorable event that culminates in a spectacular celebration. Registration to the event is open now. Save the dates and join us to this unique announcement in this unique geological setting. Please help us spreading the event among your contacts. Information about the project: https://iugs60.org/100-geosites/

Registration and Information about the event: https://geoparkea.eus/iugs-globalgeosites

ternational Union of Geological Sciences JGS e-Bulletin No. 188 – July, 20**22** 



Figure 2. The first 100 IUGS Geological Heritage Sites.

# 3. Invitation for position of Associate Editors for Episodes

Episodes invites applications for position of associate editors (AEs) in the below specified areas of specialisation from scholars working in broad fields of geoscience who wish to participate in shaping the future direction of the journal.

# About the role

Associate Editors (AEs) manage the peer review process of manuscripts submitted to Episodes. AEs are volunteers and are greatly valued for their contributions to the journal. AEs are encouraged to invite the commissions, subcommissions and task groups to regularly publish in Episodes besides inviting thematic special issues. The valuable feedback from AEs are always welcome to evolve the parameters to improve quality of the journal with appropriate content.

# Area of expertise

Episodes will consider applicants with expertise in field of Geochemistry, History of Geology, Economic Geology, and Sedimentology/Stratigraphy. Applicants with a strong record of publications in the specialized fields mentioned above and having experience as a reviewer in refereed journals are most welcome to apply.

# How to apply

Applicants should email a copy of their full CV to Publications Committee Chair (Prof. Dr. Dolores Pereira, E-mail: mdp@usal.es) and Editor-in-Chief (Prof. Dr. Jin-Yong Lee, E-Mail: hydrolee@kangwon.ac.kr), outlining reviewing and editorial experience. **Deadline for application: 15 August, 2022** 

# 4. Deep-time Digital Earth (DDE) Forum

The Deep-time Digital Earth (DDE) Forum to be co-organised by UNESCO, IUGS & DDE is to be convened at UNESCO, Paris, on November 9<sup>th</sup>, 2022, in Room II, UNESCO Headquarters, Paris,

France. The Forum is intended to give a comprehensive, synthetic overview of achievements of the DDE over three years as the first IUGS Recognized Big Science Program and a pilot project on Open Science, and to promote globalization and digitization of scientific research.

Detailed information on the Forum Program and allied activities will be shared before end of August 2022.

To know more open the link below:

https://www.iugs.org/\_files/ugd/f1fc07\_6e0a972aecf64d7f8ee5175f24c5f36d.pdf?index=true

### 5. News from the International Commission on Stratigraphy (ICS): STRATI 2023

Following the 1<sup>st</sup> congress in Lisbon (Portugal) in 2013, and additional congresses organized in Graz (Austria) in 2015 and Milan (Italy) in 2019, the 4<sup>th</sup> International Congress on Stratigraphy has been assigned by the International Commission on Stratigraphy (ICS) to Lille:

STRATI 2023 will take place at Lille, France, 11th-13th July 2023.

Lille, capital of the French Flanders, is located in the northernmost part of France, in very short travel distance (by high-speed train) from Paris (less than 60 minutes), Brussels (less than 45 minutes), and London (less than 90 minutes).

STRATI 2023 is the main scientific meeting of the ICS. It is thus dedicated to all topics and questions in updating and improving the geological time scale. The scientific program is intended to give space to all stratigraphic fields, methodologies and applications. Together with the 3 days' indoor sessions, four excursions and two one-day field trips will be organized before and after the congress. These excursions include trips to the Ordovician of Estonia, the classical Devonian-Carboniferous of Belgium, the Jurassic of the Yorkshire Coast and other classical British localities, such as Hutton's Unconformity, as well as the Cretaceous successions (including several GGSPs) of France. Day-trips will be organized to the French Channel Coast and the type-sections of the Paleogene in Belgium. The congress will also host meetings of the ICS and its subcommissions, together with workshops and social activities, including a visit of the Natural History Museum of Lille, and a conference dinner in an ancient hospice of the late 15<sup>th</sup> Century.

To know more open below:

https://www.iugs.org/\_files/ugd/f1fc07\_cec0bde2dab44ac095d7dddf01db7a34.pdf?index=true The first circular can be downloaded from the website of the International Commission on

Stratigraphy, <u>https://stratigraphy.org</u>, where a link to the conference webpage will be available very soon.

Congress e-mail address: strati2023@univ-lille.fr

Postal address: STRATI2023, UMR 8198, SN5, Univ Lille, 59655 Villeneuve d'Ascq, France

# 6. The new IUGS task force on diversity, equity and inclusion

During the 77 IUGS EC meeting in Paris, the IUGS EC decided to create a Task Force that deals with problems related to diversity, equity, and inclusion within the IUGS scientific community. The purpose of the task force is to bring the IUGS constituent groups (commissions, subcommissions, task groups, initiatives) to a reasonable balance of their members with regard to issues such as gender, geographical provenance, discipline, career stage, etc.



Silvia Peppoloni, IUGS councillor from 2018 to 2022, was appointed chair of the task force. Anna Ladenberger (Co-chair of the IUGS Global Geochemical Baselines) and Asier Hilario (Chair of the IUGS Commission Geoheritage) additional members. on will join her as The current situation within the IUGS constituent groups related to those issues has been already analyzed through a survey conducted by the IUGS Secretariat, based on the list of official participants in all IUGS constituent groups. In particular, the full gender analysis was conducted both by country and by constituent groups. An imbalance was highlighted for most of the groups: the overall average data are: Men 73% vs Women 27%.

The work of Silvia, Anna and Asier will consist in encouraging IUGS constituent groups to reach a reasonable balance of representation within their boards, by identifying barriers, suggesting strategies to be adopted, sharing information and experiences on those issues with other scientific organizations, with the aim of progressively filling the gaps and eliminating the unbalances existing within the groups.



Figure 3. 77 IUGS EC meeting in Paris.

#### 7. News from the IUGS Initiative on Forensic Geology (IFG) a. Clean Gold Program, National Institute of Criminalistics, Brasilia, Brazil

INTERPOL invited four members of IUGS-IFG to an, 'International Seminar on Illicit and Traceability in the Gold Production Chain', in collaboration with the Brazilian Federal Police, Federal Bureau of Investigations (FBI), United Nations Office on Drugs and Crime (UNODC), Organisation for Economic Co-operation and Development (OECD), various banks, financial organisation, ministries and mining companies from about 19 countries. The objective was to develop a greater understanding of how criminal gangs, cartels and terrorist organisations operate in the minerals, mining and metals industries and the consideration of geological (and other) methods and strategies for the management and mitigation of risks that include fraud, adulteration, substitution, theft, tracking, tracing and provenance determination of gold and other precious metals and minerals in the global supply chain. This also impacts on human rights violations, money laundering and misconduct in illegal and illicit mining and minerals activities around the world.

https://noticias.uol.com.br/meio-ambiente/ultimas-noticias/redacao/2022/07/08/procuradorluis-camoes-mpf-funai-nao-existe-garimpo-terras-indigenas.htm

https://g1.globo.com/fantastico/noticia/2022/07/09/baroes-do-ouro-ilegal-no-brasil-

movimentacao-bancaria-do-grupo-chegou-em-torno-de-r-16-bilhoes.ghtml--

https://geoforense.com/#calendario

# b. Latin American Congress Seminar on Forensic Geology, Bogota, Colombia

On 26-28 October 2022, IUGS-IFG plan to meet in Colombia. This will focus on the search for missing persons and include an IUGS-IFG Special Project meeting on, 'Crimes in the Minerals, Mining and Metals Industries'.

https://geoforense.com/#calendario

# c. IUGS-IFG Norway

IUGS-IFG attended the '10th World Conference on Sampling and Blending', Kristiansand, Norway from 31 May to 2 June 2022 on conflict minerals and battery minerals. A second meeting took place at the Norwegian, Kripos, Oslo, on 25 May 2022 on the use of soil in search and as trace evidence.

# d. Geophysics Questionnaire, Federal Bureau of Investigations (FBI), USA

IUGS-IFG (Dr Laurance Donnelly, Chair) was invited to review of a questionnaire. This will be distributed within the USA to gain a detailed appreciation of the use of geophysics in grand searches for burials.

#### e. Illegal Trade and Monopoly of Museum Artefacts, South America

Paleoenvironmental reconstructions were undertaken from fossiliferous material to generate knowledge of biodiversity over geological time.

https://geoforense.com/2022/07/comercio-ilegal-e-monopolio-de-artefatos-museologicos/

# f. Scientific Police Project and Forensic Analysis of Soil Traces, Brazil

Scientific Police of Paraná started a project involving the collection, analysis and interpretation of soil collected at crime scenes, with Federal Criminal Expert (Dr Fabio Salvador, IUGS-IFG Co-Officer for South America).

https://geoforense.com/2021/06/policia-cientifica-do-pr-inicia-projeto-de-analise-forense-de-vestigiosde-solo-em-parceria-com-pf-e-ccf-ufpr/

# 8. News from INHIGEO Anniversaries

# a. Occasion: Mapping the seafloor 70 years ago

# Title Marie Tharp's discovery of the Mid Ocean Ridge rift valley in 1952

Author: Sally Newcomb (USA)

This was an exciting time in the new science of oceanography as the maps became part of a complex and worldwide story. In a relatively short period knowledge of the ocean floor went from an assumed almost featureless abyssal plain to a world-wide complex of ridges, valleys and transform faults showing regularly reversing strips of magnetism. Marie Tharp was at first nearly invisible, as she took numbers

and translated them to maps. She was not allowed to go on ships to collect data, was basically ignored in published papers and was rarely referenced in histories.

## b. Occasion: IUGS founded 60 years ago

# Title: Organizing the geological sciences: Retreading the path from international congresses to scientific union

Authors: Kathleen Histon (IRELAND), Martina Kölbl-Ebert (GERMANY), Ezio Vaccari (ITALY) The International Union of Geological Sciences (IUGS) was formally and unanimously admitted by the International Council of Scientific Unions (ICSU) at the 9th General Assembly on the 28th of September 1961. The Assembly concluded that the IUGS was a direct descendant of the International Geological Congress (IGC) and therefore the normal five-year waiting period could be waived. The reasoning behind this decision was a complex story starting in the late 19<sup>th</sup> century at a meeting in Buffalo, in the state of New York (USA).

To know more open the link below: http://www.inhigeo.com/anniversaries.html

# 9. News from the Commission on Global Geochemical Baselines (CGGB)

The IUGS Commission on Global Geochemical Baselines is pleased to announce the long awaited publication of the "*International Union of Geological Sciences Manual of Standard Methods for Establishing the Global Geochemical Reference Network*". The IUGS Executive Committee (EC) recognising the importance of this Manual unanimously approved it at the 77<sup>th</sup> EC meeting in Paris (16-18 March 2022) as a formal publication for the IUGS 60<sup>th</sup> anniversary celebration in 2022.

The work on the manual started way back in 2006, but it was in 2018 when the contents of the Manual really began to take shape (2018 Annual Report). It finalised in 2021 with the addition of geodetic and parametric levelling of existing geochemical data sets.



**Figure 4.** International Union of Geological Sciences Manual of Standard Methods for Establishing the Global Geochemical Reference Network.

In total, 50 scientists (applied geochemists, soil scientists, statisticians, GIS experts, surveyor) contributed to the Manual. Each Chapter was peer-reviewed by at least two external reviewers. In total, the peer-review was carried out by 23 reviewers from 13 countries.

This Manual provides in great detail the standardised methods that should be employed for mapping the abundance and spatial distribution of chemical elements in rocks, soils, sediments, and water across the entire land surface of the Earth based on sampling according to the <u>Global Terrestrial Network</u>. <u>Darnley *et al.*</u> (1995) introduced the concept of producing a global-scale, multi-media geochemical atlas by sampling on the basis of the Global Geochemical Reference Network (GRN). The GRN is a grid-based sampling scheme comprised of 19,833 cells covering the whole globe. Of these, 7356 cells, approximately 160 x 160 km in size, cover the land surface of the Earth, and are known as the Global Terrestrial Network (GTN).

The 515-page book contains separate chapters providing extensive information on sampling protocols for rocks, residual soil, humus, stream water, stream sediments, and overbank and floodplain sediments. There are also chapters discussing sample site selection; sample preparation; quality control procedures, including development of project reference materials; data management; map preparation; project management; and information on how to level existing geochemical data sets.

The sampling manual is available free of charge and can be downloaded from the <u>Publications</u> web page of the <u>IUGS</u> Commission on Global Geochemical Baselines (<u>https://www.globalgeochemicalbaselines.eu/</u>).

# 10. News from IUGS TecTask

The Henk Zwart Award was presented to Professor Emerita Renée Heilbronner (University of Basel, Switzerland). The Henk Zwart Award is given by TecTask, the IUGS Commission for Structural Geology and Tectonics, to further and promote research in structural geology and tectonics in any of its fields. <u>www.tectask.org.</u>

To know more about the award please open

http://www.tectask.org/henk-zwart-award/.

The citation for Professor Emerita Renée Heilbronner highlights the significant contribution to analysing rock textures:

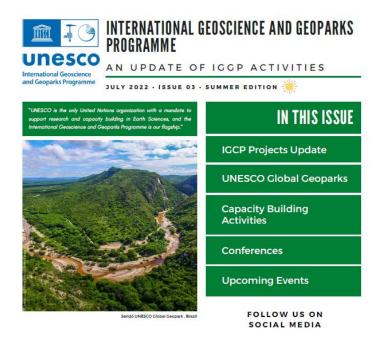
In her long career spanning more than four decades, Professor Renée Heilbronner has made path breaking contributions in Structural Geology, particularly in the field of rock deformation textures and microstructures. She developed the Computer Integrated Polarization (CIP) microscopy technique, which is used extensively by several researchers across the world for textural analysis of rocks and fabric quantification. This also formed the foundation of the textbook she wrote in 2014 viz. "Image Analysis in Earth Sciences: Microstructure and Texture Analysis of Earth Materials". Her research contributions have been key to quantifying strain, as well as in enhancing our understanding of rock microstructure evolution, and its relation to rock rheology. Professor Heilbronner has had tremendous influence on the Structural Geology community, not only through her publications, but also through her teaching and workshop activities. She has mentored several geoscientists in her long academic career, who in turn have gone on to leave their own independent mark in Structural Geology.

nternational Union of Geological Sciences IUGS e-Bulletin No. 188 – July, 20**22** 



**Figure 5.** The Award was presented to Prof Heilbronner at the Deformation Mechanisms, Rheology and Tectonics (DRT) conference in Catania (5-7 July, 2022) by Dr Taija Torvela (vice-chair of TecTask)

#### 11.International Geoscience and Geoparks programme Summer 2022 newsletter



**Figure 6.** International Geoscience and Geoparks programme Summer 2022 newsletter. To know more open the link below: <u>https://en.unesco.org/international-geoscience-and-geoparks-programme</u>



**For the IUGS website**: A one-page concise text (up to about 500 words), if possible providing a weblink (e.g. to an IUGS activity website).

Each contribution to the IUGS e-Bulletin, website and/or social media should be marked as to which target medium or media it should be published in. Each contribution should be sent, at the same time, to the following addresses:

gurmeet28374@gmail.com(e-Bulletin Editor-in-Chief)giuseppe.dicapua@ingv.it(Webmaster)gurmeet28374@gmail.com(Social Media Manager)

#### Time Frame for submissions to the e-Bulletin:

- 1. IUGS sends a reminder to leaders of activities in the last week of each month;
- **2.** Contributions should be provided by the  $16^{th}$  day of every month.
- **3.** IUGS will evaluate all submitted items in terms of urgency and will allocate these to the next monthly issue or a later issue and will also check that these comply with IUGS policy for publications and ethics;
- **4.** The IUGS Publications Committee Team will aim to compile monthly e-Bulletin by the 25<sup>th</sup> day of the month and send it to the IUGS Secretariat;
- 5. The IUGS Secretariat will dispatch the e-Bulletin to the IUGS Community on, or before, the last day of each month;

This time frame may vary due to public holidays that affect the e-Bulletin Team and IUGS Secretariat such as Christmas and Chinese New Year.

#### NOTES

• Please check the IUGS <u>Calendar of Events</u> for upcoming scientific meetings. If you require information on international conferences, meetings, etc. to be considered for inclusion in this Calendar please mail to: <u>giuseppe.dicapua@ingv.it</u>

• To be added to or removed from the IUGS e-Bulletin distribution list, please mail to: <u>iugs.beijing@gmail.com</u> or <u>secretariat@iugs.org</u>.

• Follow the IUGS on Social Media! We are on Facebook, Twitter, and LinkedIn.

 Check the IUGS website: <u>http://www.iugs.org/</u> Edited by: Dr. Gurmeet Kaur, Panjab University, Chandigarh, India

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