

Our Vision Is Your Opportunity


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Global Environmental Psychology, 2023, Vol. 1, Article e11841, <https://doi.org/10.5964/gep.11841>

Published (VoR): 2023-11-06

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Badges for Good Research Practices:  Diversity Statement.

Sharing insights is a fundamental part of science. For many disciplines, academic journals are the key channel through which researchers share what they have learnt through their empirical and theoretical work. However, the existing academic publishing system has some serious flaws. In this editorial, we briefly point to some of these flaws and describe what steps we have already taken and are planning to take to make *Global Environmental Psychology* (GEP) a journal that will help to make research in our field more accessible, diverse and transparent (GEP's key priorities are summarized in Figure 1).

Figure 1

Key Elements of GEP's Vision



Accessibility

First, we would like to raise the issue of inequitable access. A lot of research is published behind a paywall, in subscription-based journals, meaning that readers can only access



publications if their institutions have a costly subscription or if they pay for the individual article. More recently, the problem of accessibility has been somewhat mitigated by business models that make articles freely available but instead charge authors an often immense publication fee. While this alternative business model is better for readers, the publication fees create a new barrier for authors and their institutions, putting those with fewer resources at a disadvantage (Ross-Hellauer et al., 2022). At GEP, there are no cost-related access barriers, neither for authors nor for readers. Thanks to public funding made available through the Leibniz Institute for Psychology (ZPID) based in Trier (Germany) all publications are published and accessible free of charge.

Accessibility can also be hampered by linguistic barriers. The use of jargon, highly technical method and result sections, and the prevalent use of English makes academic work difficult to digest for readers with other professional, educational, and linguistic backgrounds. To facilitate understanding for a broad readership and dissemination, GEP asks authors to prepare a non-technical summary for a non-academic audience. Moreover, authors can add a non-English abstract to their work.

Diversity

In addition to accessibility problems, environmental psychology struggles with a lack of diversity. A large part of the research published in the leading journals in the field of environmental psychology relies on north-western Europe and British-descent samples, hence a very small and by no means representative proportion of humanity (Tam & Milfont, 2020). The lack of insights from currently underrepresented groups prevents not only the diversification of knowledge, but also the validation of psychological theories across human groups (Henrich et al., 2010).

To contribute to more diverse research in environmental psychology, GEP values diversity as a key criterion when evaluating manuscripts (see our [Review Guidelines](#)). We consider theoretical, methodological (e.g., quantitative, qualitative, mixed methods), and sociocultural diversity. Authors are explicitly encouraged to diversify their work (e.g., by collaborating with underrepresented co-authors or collecting data with underrepresented samples) and to discuss the generalizability of their findings.

As a particularly innovative step, GEP awards a diversity badge if articles declare what steps they have taken to increase diversity (Figure 2; Brügger & Richter, 2023). The purpose of this diversity statement (for an example, see end of this article; see also Cell Press, 2023) is twofold. First, it makes diversity issues and possible countermeasures visible for authors and readers. Second, similar to Open Science Badges (Blohowiak et al., 2013), the diversity badge should work as an incentive for authors. Our hope is that this encourages the field to collectively move towards a more diverse academic landscape.

On a structural level, GEP embraces diversity within the journal's editorial team and board members. About half of our editors and Editorial Board members are from geographically diverse backgrounds (i.e., from countries outside North America and Northwestern Europe; Henrich et al., 2010; Steltenpohl et al., 2021). This diverse team facilitates global outreach and publication of work coming from otherwise underrepresented regions and populations.

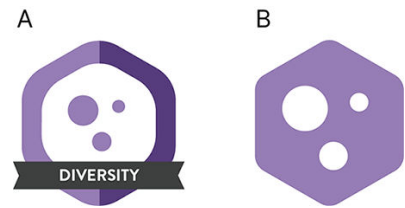
Open and Transparent Research

In the last two decades, standard research practices have increasingly come under scrutiny because they undermine key principles of good science such as transparency and reproducibility (Open Science Collaboration, 2015); while some practices are “merely” questionable, others are simply fraud (Spellman, 2015). Fortunately, there are promising steps that authors and publishers can take to mitigate these problems and improve the quality of research (e.g., Artner et al., 2021; Chambers & Tzavella, 2022).

Transparent, reproducible, and open research practices are paramount to GEP. We have therefore adopted ambitious open science standards (Aczel et al., 2020; Nosek et al., 2015). These include, for example, the requirement that authors share their data, materials, and code. Moreover, GEP encourages authors to submit their work as Registered Reports, where the methods and planned analyses are reviewed prior to data collection. If the quality of the submission is sufficiently high, the article is provisionally accepted for publication before data collection starts (Chambers & Tzavella, 2022). Another measure to increase transparency is that GEP makes pre-publication peer-reviews available alongside published articles. We are proud that, thanks to our ambitious open science policies, we are currently in 5th place among the 2,613 ranked journals in the TOP factor ranking (as of 23 June 2023; see <https://topfactor.org/journals>).

Figure 2

Diversity Badge for Medium (A) and Small Print Areas (B)



Evidently, implementing these standards comes at several (non-financial) costs: Authors must adhere to reporting guidelines when writing their manuscript, properly document and share their data, materials, and code, and answer extra questions during the submission process. Thus, making research more open requires skills that some authors need to learn. Fortunately, there are excellent tutorials and introductions into open science (Crüwell et al., 2019; Heise et al., 2023; Kathawalla et al., 2021), some of which are included in the official GEP article template. We plan to provide further resources in the future.

GEP's open science policies do not only create extra work for authors, but also for editors: They need to ensure that authors adhere to the guidelines and, together with the publishing team, check the eligibility for open science badges and make relevant information about adherence to the standards publicly available (e.g., the transparency checklist to enable external evaluation of concordance between policies and procedures; Mayo-Wilson et al., 2021).

Although the submission process at GEP is more taxing compared to journals with laxer open science standards, we are convinced that open and transparent research is the only way forward and that it will pay off in the long run. Transparency and openness are crucial ingredients to research quality and increase trust in research outcomes (Schneider et al., 2022; Song et al., 2022). Individual researchers benefit from adopting open science practices through reputational gains, increased chances of publication, and more citations (Allen & Mehler, 2019; McKiernan et al., 2016; Ottaviani, 2016).

Your Opportunity

We are excited to offer GEP as a platform for accessible, diverse, and transparent research. But to make this vision a reality, we need all of you. Only if we work together, can we make a change.

You can contribute in various ways and roles. As an *author* you can contribute to implementing our vision by submitting your best work. How progressively you want to implement open science and diversity standards is up to you. You can either do just the minimum and adhere to our open science and diversity standards. Or you raise the bar by pre-registering your study or submitting it as a Registered Report. A progressive step to promote diversity could be to determine the order of authors based on the level of marginalization that they are experiencing in the academic and the wider societal context (the social justice based Academic Wheel of Privilege may be useful to this end, Elsherif et al., 2022).

In addition to submitting your own work, you can support GEP's vision as a *reviewer* and use diversity and transparency as criteria when assessing the work of peers (see GEP's manuscript evaluation criteria).

Opportunities to contribute to GEP's vision will also come up outside of publication-oriented activities. We are planning capacity building measures intended mainly for researchers from underprivileged backgrounds and those early in their careers. One way to contribute could be to share and evaluate resources to promote research and writing skills (e.g., open science tutorials, programming courses, academic writing tools).

We are also exploring the idea of introducing an academic matchmaking platform. This platform would allow researchers to search for and collaborate with peers who have complementing skills (e.g., specific methodological, analytical, cultural, linguistic expertise) or resources (e.g., access to specific populations, financial resources, computing power). Facilitating collaboration in this way will build capacity for all researchers involved. You can contribute to this project by joining the planned matchmaking platform and offering your expertise to those who would profit the most. As an editor or reviewer, you could direct authors of submissions that have potential but also severe weaknesses to the platform to seek support in improving their work. If you are interested in the latter three opportunities, watch out for calls for assistance on the journal's website and on social media, read future editorials, or get in touch with us directly.

Obviously you can also become an advocate of open science and diversity in ways that are independent of GEP. You can more generally adopt open science practices in your work and support your colleagues, students, or supervisor in so doing (for tips see Crüwell et al., 2019; Heise et al., 2023; Kathawalla et al., 2021). When you submit your work for publication, choose an outlet with high transparency and openness standards (see <https://topfactor.org/>). To promote diversity, you may reach out to under-privileged academics for collaboration and give them priority in the order of authors or offer them the role as PI or co-PI in fellow applications. As a student, you could critically reflect on the diversity aspect in your learning materials. If you are writing an essay or a thesis, you and your supervisor could actively look for diverse sources to base your work on (for additional ideas to diversify psychological research, see Puthillam et al., 2022; Rad et al., 2018; Steltenpohl et al., 2021; Tam & Milfont, 2020).

For the future of GEP, we are looking forward to reading, administering, and publishing high quality work that signals that our field is changing: becoming more accessible, more diverse, and more transparent.

Openness and Transparency Statements

The present article has been checked by its handling editor(s) for compliance with the journal's open science and transparency policies. The completed *Transparency Checklist* is publicly available at:

<https://doi.org/10.23668/psycharchives.13194>

Author Contributions.

ADRIAN BRÜGGER: Conceptualization. Writing – original draft. Writing – review & editing.

ISABEL RICHTER: Writing – original draft. Writing – review & editing.

Acknowledgments. The authors want to use this editorial to acknowledge and thank the people without whom this journal would never have seen the light of day. Sabine Pahl, Wouter Poortinga, Linda Steg, and Claude Messner, thank you for believing in us and supporting us motivationally, intellectually, and institutionally in founding GEP. Janet Veldstra, thank you for contributing so actively during the brainstorming and application stage. Armin Günther and PsychOpen team, thank you for giving us the chance to develop this journal and for sharing your vast experience, critical thinking and constructive advice. Leah Rangi, thank you for designing this beautiful diversity badge for us. Raphael Krastev, thank you for helping design the journal's logo.

Funding. The authors have no funding to report.

Competing Interests. The authors have declared that no competing interests exist.

Diversity Statement. In the list below, the check mark (☑) indicates which steps were taken to increase diversity within the context of this paper. Steps that were not taken or did not apply are unmarked (☐).

- Ethnically or otherwise diverse sample(s)
- Gender balanced sample(s)
- Inclusive gender measure
- Inclusive materials
- Sampling justification
- Extensive sample description
- Discussion of generalizability
- Diverse reference list
- Underprivileged / minority author(s)
- Early career author(s)
- Degree of privilege/marginalization considered in authorship order
- Author(s) from sampled population (avoiding 'helicopter science')

Supplementary Materials. The following table provides an overview of the accessibility of supplementary materials (if any) for this paper.

Type of supplementary materials	Availability/Access
Data	Not applicable (no data analysed).
Code	Not applicable (no analysis code used).
Material	Not applicable (no materials used).

Type of supplementary materials	Availability/Access
Study/Analysis preregistration	Not applicable (not an empirical study).

Badges for Good Research Practices.

Open data: NO.

Open code: NO.

Open materials: NO.

Preregistration: NO.

Diversity statement: YES.

Note: YES = the present article meets the criteria for awarding the badge. NO = the present article does not meet the criteria for awarding the badge or the criteria are not applicable.

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