In press: Perspectives on Psychological Science

Global diversity of authors, editors, and journal ownership across subdisciplines of psychology: current state and policy implications

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Author Note:

Conflict of interest: No conflict of interest declared.

Author contributions: ZL designed the study; NL collected and analyzed the data under the guidance of ZL; ZL wrote the manuscript.

Acknowledgments: The study was supported by the National Natural Science Foundation of China (32071045), Guangdong Basic and Applied Basic Research Foundation (2019A1515110574), and Shenzhen Fundamental Research Program (JCYJ20210324134603010).

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Abstract

Diversity is the fuel of innovation. Global diversity—geographical or international diversification—is indispensable to develop a true psychological science of human beings, but remains poorly understood. We surveyed 68 top psychology journals in ten subdisciplines and examined global diversity of authors, editors (i.e., members of academic editorial teams), and journal ownership. Results show that 1) global diversity of authorship, editorship, and ownership is low in top psychology journals, with the United States (US) boasting outsized influences; 2) disparity intensifies along the hierarchy of authors, editors, and journal ownership; it also substantially differ between subdisciplines and journal types; 3) removing the US markedly increases global diversity and eliminates differences in diversity between subdisciplines and between authorship and editorship; 4) more authors and editors are from the journal's home country (vs. a foreign journal) and from the editor-in-chief's home country (vs. a journal with a foreign editor-in-chief); the home country biases are most pronounced in the US—journals from the US or with US editors-in-chief have the lowest global diversity in authorship and editorship. These results provide substantial novel insights into the global diversity of psychology journals, with implications for a new diversity policy to stimulate the generation of variety—and, by extension, innovation.

Keywords: global diversity, bias, psychology, editor, journal

Demographic diversity in the workforce has been shown to enhance scientific innovation (Burt, 2004; Hofstra et al., 2020). The importance of diversity is further accentuated in the context of psychological science as a discipline devoted to the study of human behavior. That is, research on a homogeneous group of participants by a homogeneous group of researchers provides **only** a tiny window onto humanity. A better, more complete understanding of human behavior requires perspectives informed and enriched by many different forms of diversity, including gender, race, and country of origin (Bell et al., 2011).

Recent work on the diversity of gender (e.g., Gruber et al., 2021) and race (e.g., Roberts et al., 2020) in psychological science has highlighted gender gaps in career advancement and racial inequality in psychological research. Here, we focus on global diversity—i.e., geographical or international diversification (Espin et al., 2017; Hodgson & Rothman, 1999)—a topic that has remained poorly understood in psychology (Cheon et al., 2020).

The Importance of Global Diversity

Global diversity brings different experiences and perspectives to the practice of science that is essential to advancing a true psychological science of human behavior. The importance of global diversity manifests itself in several different but related ways in advancing psychological science.

Epistemological plurality and unique phenomena

Scientists, like other people, are shaped and constrained by their natural, cultural, and social environments, without them being fully aware of the influence. Such influences range from their belief systems about the nature and acquisition of knowledge

to their specific research interests and approaches (Sue, 1999). Global diversity therefore bestows plurality of approaches and epistemological orientations, which ultimately affects the range of research topics being studied and the approaches used. The importance of such plurality and diversity is apparent from the perspective of evolution—variety serves as the fuel of innovation. Diminished global diversity limits variety, stifling the variation upon which the evolutionary selection of innovative ideas operates (Metcalf, 1994).

Indeed, the richness of human diversity means that, without adequate global diversity, important but unique phenomena outside of the United States (US) may otherwise go unnoticed. For example, during rapid but unequal economic developments, parents may migrate to big cities or other countries for better jobs, leaving children to the care of other family members, usually grandparents (Jingzhong & Lu, 2011). Though rare in a developed economy such as that of the US, such phenomena create a large number of left-behind children in developing countries in Asia, particularly in China due to its sheer population and scale of economy. The psychology (Fan et al., 2010), health (Li et al., 2015), and education (Sun et al., 2015) of left-behind children then **present** novel issues that have important implications for theory and practice in child development (Wang & Mesman, 2015) and mental health (Fellmeth et al., 2018). As another example, during the month-long Ramadan, Muslims fast by not eating or drinking from dawn to sunset. Such religious practice may have unique implications for the psychology of dieting and religion (e.g., Bayani et al., 2020; Gilavand & Fatahiasi, 2018).

Sociocultural contexts and distinct manifestations

But even shared concepts and phenomena can take different forms in different societal contexts. If there is anything we have learned from cultural psychology, it is that universals are quite rare (Heine, 2016). **Culture** can greatly affect people's concept of the self, from seeing oneself as an independent agent as is typical in individualistic cultures such as the US, to seeing oneself as an interdependent, connected part as is typical in collectivistic cultures such as China (Markus & Kitayama, 1991). Indeed, it has been suggested that, from susceptibility to visual illusions to behaviors in ultimatum games, the typical US samples in research studies—or generally those drawn from Western, educated, industrialized, rich, and democratic (WEIRD) societies—are unrepresentative of humans in general (Henrich et al., 2010).

Take grandparenting as an example. At the confluence of multiple sociocultural factors in China—high female labor force participation rates; limited flexibility in work arrangement; limited daycare services; strong intergenerational ties (kinship); low statutory retirement age for women (55 for **party cadres, civil servants, and employees of state enterprises**, 50 for other workers; a policy set in 1951 and 1955)—it is not uncommon to see grandparents move in to live with the family of their adult child **year-round** and do the majority of the caring of the grandchildren (Chen et al., 2000). Grandparenting in such three-generation households is rather different from the norm in the US, in both intensity and length (Burnette et al., 2013). It also diverges from grandparenting in skipped-generation households (i.e., grandparents caring for left-behind children), with distinct implications for mental and physical health (e.g., Chen & Liu, 2012; Choi & Zhang, 2021).

Generalization and external validity

Global diversity is **innately** important in the context of external validity—that is, how well a finding can generalize to other settings (e.g., Mitchell, 2012). **Whether interventions, treatments, measures, or experimental effects are generalizable to diverse nations and cultures is a vital research question** (Berkowitz & Donnerstein, 1982). **Culturally misapplied interventions can do more harm than good** (Christopher et al., 2014). The general failure of traditional psychology in effectively addressing the mental health needs of people with African ancestry has given rise to an Africana cultural paradigm, one that emphasizes an indigenous, emic (as opposed to etic) frame of reference (Myers et al., 2021). Similarly, the field of psychological testing has made it clear that, before measures and questionnaires can be applied to a different cultural context, they must be shown to assess the same construct across different cultures—i.e., cross-cultural measurement invariance/validity (Milfont & Fischer, 2010). In the words of clinical psychologist Stanley Sue (1999), *“If we want to draw conclusions about human beings, we must study human beings in all their diversity and not particular samples”*.

Toward a Multi-level Understanding of Global Diversity

Thus, from unique issues and phenomena to cultural, societal influences and external validity, global diversity has much to offer in advancing a true psychological science of human beings. Global diversity has received much less attention than it deserves, despite the well-known limitations and unrepresentativeness of WEIRD samples (Henrich et al., 2010). For example, surveys of publications in the field’s leading journal *Psychological Science* showed that over 94% of studies sampled Western

countries (i.e., English-speaking countries, Europe, and Israel) in 2014, with a similar pattern in 2017 (Rad et al., 2018). In particular, psychology research appears to have a US-centric bias: compared with other regions in the world, samples from the US were less likely to be specified in the title (Cheon et al., 2020).

A natural antidote to the WEIRD or US bias is globally diverse authorship. For researchers typically use convenience samples (e.g., local college students) due to familiarity and cost (e.g., Jager et al., 2017; Landers & Behrend, 2015), such that sampling characteristics are intimately connected to author characteristics. At the same time, **publications in** a journal—that is, the fate of submitted manuscripts—are **presumably** affected by members of the academic editorial team, including the editor-in-chief (EiC). Such influences manifest in the kind of scholarship favored and valued (e.g., as communicated in editorials) and, at least in some cases, even in manuscript decision bias (e.g., Petersen, 2019). The appointment of EiCs, on the other hand, could be affected by the ownership of the journal—i.e., journals may tend to have EiCs from the same country as the journal's **publishing society or publisher**. The reverse influence—authorship base affecting the composition of editorship—is also conceivable since members of the academic editorial team are typically prolific authors themselves, creating a bidirectional reinforcing mechanism. Thus, to truly understand the global diversity of our science, we must **evaluate** the global diversity of our top journals—which have the highest visibility and steer the directions of the field—across multiple subdisciplines and at multiple levels of the hierarchy, from authorship and editorship to journal ownership. Only with a comprehensive understanding can we derive a more effective policy to promote global diversity.

While a comprehensive understanding of the state of global diversity is currently lacking, existing evidence from limited prior studies in psychological science is concerning. Surveys of six major psychology journals—all from the American Psychological Association (APA)—show a minuscule representation outside of English-speaking countries and Europe: authors were about 4.5% between 2014 and 2018 (Thalmayer et al., 2021), compared with about 2.5% between 2003 and 2007 (Arnett, 2008); associate editors and other editorial members were about 1.6% in 2018, compared with 1.2% in 2007; there were no EiCs represented in both periods. In contrast to the non-WEIRD representation, the US as a single country dominated psychological science: authors were about 64% between 2014 and 2018 (Thalmayer et al., 2021), a 9% drop from about 73% during 2003 to 2007 (Arnett, 2008) that was primarily replaced by authors from Europe and other English-speaking countries; associate editors and other editorial members were 82% in both periods. This finding was similar to a survey of 50 generalist psychology journals in 2019, showing 61% of academic editorial members from the US (Palser et al., 2021).

To obtain a comprehensive picture of the current state of global diversity in top psychology journals, it is necessary to survey a representative list of journals in diverse fields—one that goes beyond a specific category of journals or a few journals published by the APA, which may reflect specific practice at the APA (it is after all the *American Psychological Association*). Moreover, when disparity is observed, the source of disparity may not necessarily originate from the site of statistical collection, and one must explore disparity—and potential bias—at other levels as well.

Consider gender disparity in science, technology, engineering, mathematics (STEM) as an example. The gender disparity of STEM tenure-track assistant professors in the US might not necessarily reflect different *rejection* rates for male and female applicants, but different *application* rates—women appear to be far less likely than men to apply (Ceci et al., 2014). On the other hand, although survey experiments reveal that female applicants are preferred over otherwise identical male applicants in the US (Williams & Ceci, 2015) and the Nordic region (Carlsson et al., 2021), biases against women in academic hiring have also been documented, such as relationship status discrimination (Rivera, 2017), reflecting the wider *sociocultural* context such as cultural stereotypes and organizational practices (Gruber et al., 2021; Llorens et al., 2021). In the present context, disparity in authorship and editorship may be interconnected, and both may also be influenced by journal ownership, highlighting the importance of examining disparity across multiple levels.

Here we surveyed top psychology journals across ten subdisciplines in psychological science, examined global diversity of authors, editors, and journal ownership, and explored their connections. **In this article, we will use the term “EiC(s)” for the head(s) of the editorial team, “editorial board members (EBMs)” for the rest of the editorial team (typically, associate editors and consulting or review editors), and “editors” collectively for EiC(s) and EBMs.** We aim to address four questions. 1) What is the current international distributions of **authors, editors, EiCs, and journal ownership**, both overall and at the level of subdisciplines and types of journals (empirical, review, and method)? 2) How might the extent of global diversity change across the hierarchy of authors, editors, EiCs, and owners, as well as across subdisciplines and journal types

(empirical, review, and method)? 3) What effect does the US have on global diversity? 4) What is the influence of the home country of the journal and the journal EiC on the distribution of its authorship and editorship? Addressing these questions helps to 1) provide a comprehensive, quantitative picture that delineates the global distributions of **authors, editors, EiCs, and journal ownership**, and 2) characterize factors that influence these distributions.

Method

Journal selection and categorization. To objectively obtain a representative sample of top psychology journals across different subfields, we used the latest Journal Citation Reports (JCR) by Clarivate Analytics. At the time of data collection (spring 2021), the latest JCR was the 2020 edition. Psychology is indexed by two databases: the Science Citation Index Expanded (SCIE) and the Social Sciences Citation Index (SSCI). In SCIE, there is no subdivision for psychological science, just one generic category, *psychology*; in SSCI, there are ten subfields in psychology: *applied*; *biological*; *clinical*; *developmental*; *educational*; *experimental*; *mathematical*; *multidisciplinary*; *psychoanalysis*; and *social*. Accordingly, the ten subcategories were selected to represent the diverse subfields of psychology.

To select the top journals within each category (including the generic psychology category in SCIE), journals were ranked according to their impact factors (IFs) in the 2020 edition. The two-year journal IF is the average citations accrued in that year (i.e., 2019 for the 2020 edition) of publications from the two preceding years (2017 and 2018). The top 10% of journals with the highest IFs from each category were selected. Because we were interested in comparing the countries of affiliations of **authors and editors**,

journals where the editors were primarily full-time staff from the publisher were excluded, and the next journals within that category served as replacements. One such journal, *Nature Human Behaviour*, was excluded accordingly and replaced by the next journal, *Developmental Science*. In total, 68 different journals were included and analyzed accordingly (the full list of the 68 journals and associated information is provided in **Table 1**).

In addition to subfield categorization, journals were further categorized as outlets primarily for review articles, empirical articles, or methods articles because these journals feature distinct types of scholarship. In particular, compared with empirical articles, review articles feature more well-established researchers (e.g., submission to some review journals are invitation-only). In categorizing these journals, most were straightforward with two exceptions: *American Psychologist* (which publishes “empirical reports, meta-analyses, and other types of scholarly reviews”) and *Psychonomic Bulletin & Review* (which publishes “theory and review articles and brief reports of outstanding experimental work”). Both were categorized as empirical journals because substantial numbers of empirical studies were published there.

Journal authors. To examine the contributions of different countries to each journal, we examined the countries of author affiliations. This was based on “contributions by country/region” in JCR for each journal, which provides specific counts for all the countries or regions that contributed papers to the journal in the most recent three-year period (namely, 2017 to 2019). Each country receives one and only one count from a paper as long as one affiliation is located in that country. The total count of

authors for the 68 journals was 37,801 from 110 countries. Based on journal averages, the top 20 countries totaled 93.3%, each with a share higher than 0.5%.

Journal editors. The academic editorial team of a journal typically consists of a primary editor (EiC), several associate editors, and a number of other editorial board members, such as consulting or review editors. The EiC steers the journal by laying out editorial policy, direction, standards, and practices, and is typically tasked to appoint associate editors and other editorial board members. EiCs may have different titles in different journals (e.g., “Editor” in *Psychoanalytic Psychology*; “Co-Editors” in *Annual Review of Clinical Psychology*; “Editor-in-Chief” in *Annals of Behavioral Medicine*). Some journals have multiple EiCs; for example, *Journal of Personality and Social Psychology* has three independent sections, each with its own EiC and a separate editorial board.

Given their leadership role, EiCs were analyzed separately from other members of the board. Multiple EiCs within a single journal were all included. Deputy EiCs were not considered EiCs (e.g., *Journal of Child Psychology and Psychiatry*). Founding and past EiCs were excluded, as were EiCs who were full-time staff of the publisher (e.g., Lindsey Drayton at *Trends in Cognitive Sciences*). The final sample includes 82 EiCs. The record was checked to be accurate as of May 2021.

All the members of then-current editorial team from each journal was extracted between February 2021 and March 2021. Staff members from the publisher were not included, such as editorial assistants or managers staffing the editorial office. The final sample includes 5,653 editors—82 EiCs and 5,571 EBM.

Determining journal ownership. We manually tracked down the ownership of each of the 68 journals. Some journals belong to academic societies and associations, some to publishers. For journals belonging to an academic society or association, we coded the country where the academic society or association was located. In cases where the society or association had no clear country of origin, we coded the region instead (e.g., European Association of Personality Psychology, European Society for Child and Adolescent Psychiatry, and European Health Psychology Society were coded as “Europe” instead of a specific country).

For journals belonging to a publisher, we coded the country of origin of the publisher. However, since some publishers were later merged to or acquired by another publisher (e.g., Academic Press, JAI Press, Pergamon Press, and Cell Press were acquired by Elsevier; Blackwell Publishing by John Wiley & Sons; Routledge by Taylor & Francis; Plenum Publishing Corporation by Springer), to capture historical legacy, we coded the country of origin of the initial publisher, based on information in the first issue of the journal.

Data analysis. After identifying the 5,571 EBMs and 82 EiCs for the included journals, we manually searched their affiliations one by one. Affiliations were extracted from journal websites, institutional websites, ResearchGate, or LinkedIn through search engines. Countries of affiliations were then coded based on territories rather than sovereign states, as in JCR (e.g., Hong Kong was coded separately from mainland China). Given our focus at the country level, these territories were later combined with the respective sovereign states for data analysis. In rare cases when a member had affiliations from two countries, each country was counted as half ($n = 15$ editors).

Although journals have largely the same number of EiCs (most have only one EiC), they can differ markedly in their **total size of the editorial team** (from two in *Advances in Experimental Social Psychology* to 375 in *Journal of Personality and Social Psychology*) as well as author counts (from 29 in *Psychological Science in the Public Interest* to 6,020 in *Annals of Behavioral Medicine*). In principle, data can be aggregated based either on journal averages by using *proportion* data within each journal (that is, treating each journal equally irrespective of its size) or on the exact *counts* of authors, editors, and EICs within each journal (that is, weighing each journal based on its size). Although there is no strong a priori reason to choose one way or the other, we report the results based on journal averages to give each journal equal weights—results based on exact counts are provided in online materials (they were largely the same; see **Table S1 to S8 in Supplemental Materials**).

Diversity was quantified using Simpson's diversity index (Simpson, 1949), based on the probability that two randomly selected items (journals, editors, authors, etc.) from a sample will belong to different countries:

$$D = 1 - \frac{\sum n(n-1)}{N(N-1)}$$

In this formula, n is the number of items in each country; N is the total number of items. D takes values between 0 and 1, with higher values denoting greater diversity. Values were statistically compared using diversity t -tests based on variance estimations of actual counts (Brower et al., 1998), as implemented by PAST, version 4.07 (Hammer et al., 2001).

Transparency and openness. Data, analysis code, and research materials used in the study are available online (<https://osf.io/4q69f/>).

Results

The section is organized into four subsections. We first describe the geographical distributions of **authors, editors, EiCs, and journal ownership** in the surveyed journals, as separated by subdisciplines and types of journals (review, empirical, and method) for **author and editor** distributions. We then quantify global diversity using Simpson's diversity index and examine differences in diversity across authors, editors, EiCs, and owners, as well as across subdisciplines and journal types. We go on to explore how global diversity and its distributions might be related to the US—namely, looking at global diversity with and without the US and the US's share of editors compared with its share of authors. Finally, we report the influence of the home country of the journal and the EiC on the distribution of its authorship and editorship.

*Global distributions of **authors, editors, EiCs, and journal ownership***

Distributions of authors. Global distributions of the 37,801 author count were tallied for each of the six continents and for the US separately, organized by journal subdisciplines (from applied to social) and journal types (empirical, review, and method; **Table 2**). The US averaged 44% of authors (ranging from 32% in mathematical psychology to 73% in psychoanalysis), with a higher proportion in review journals (48%) than empirical (42%) or method (39%) journals. Europe averaged 36% authors. Outside of North America and Europe, the rest of the world averaged 14% authors.

Distributions of editors. The global distribution of the 5,653 editors was analyzed in the same way as authors (**Table 3**). The US as a country averaged 60% of editors (ranging from 46% in experimental psychology to 94% in psychoanalysis), with a higher

proportion in method journals (68%) than review (62%) or empirical (59%) journals. Europe as a whole averaged 25% editors. Outside of North America and Europe, the rest of the world averaged 8.6% editors (notwithstanding the global population share of 82%). The distribution was similar when excluding duplicate editors across journals (of the 4,884 unique editors, 63% were from the US and 23% from Europe).

Distributions of EiCs and journal owner countries. The 67 EiCs count (after the 82 EiCs were normalized to one count per journal) came from 11 countries: 73.4% from the US, 10.2% from the UK, and the remaining 16.4% from Canada, Australia, and seven other European countries. Similarly, the 68 top journals collectively belong to just seven countries (excluding Europe as a whole; **Table 4**): 72.1% to the US, 14.7% to the UK, and the remaining 13.2% to five other European countries and Europe as a whole.

Variations in subdisciplines and journal types notwithstanding, the US and, to a much lesser extent, Europe boast across-the-board outsized influence in top psychology journals, both in **authorship, editorship, and ownership**.

Quantifying and comparing global diversity

Diversity across authors, editors, EiCs, and owners. To quantify and compare the extent of diversity, we examined the number of countries represented and calculated Simpson's diversity index (D). Simpson's diversity index takes into account both the number of countries present and the evenness of distributions in these countries. It ranges from 0 to 1, with a higher number corresponding with more diversity. There were 110 countries with authors ($D = 0.76$), 54 countries with editors ($D = 0.58$), 11 countries with EiCs ($D = 0.44$), and 7 countries as journal owners ($D = 0.46$), demonstrating progressive

decline in global diversity from authors to editors ($t(6621.8) = 22.26, p < 0.001$) and to EiCs (vs. editors, $t(84.2) = 2.14, p = 0.04$).

Diversity across subdisciplines and journal types. Differences in diversity were substantial across subdisciplines and moderate for different types of journals. Among the ten subdisciplines, authorship diversity was the lowest for psychoanalysis ($D = 0.44$) and highest for experimental psychology ($D = 0.87$; $t(511.5) = 15.22, p < 0.001$), with a similar pattern in editorship diversity—lowest for psychoanalysis ($D = 0.12$) and highest for experimental psychology ($D = 0.75$; $t(183.5) = 14.20, p < 0.001$).

For journal types, authorship diversity was higher in method ($D = 0.86$) than empirical ($D = 0.75$; $t(1385.8) = 12.57, p < 0.001$) and review ($D = 0.77$; $t(2363) = 8.90, p < 0.001$) journals. But the reverse was true for editorship diversity, with higher diversity in empirical ($D = 0.58$; $t(240.6) = 1.80, p = 0.07$) and review ($D = 0.59$; $t(317.7) = 1.96, p = 0.05$) journals than method ($D = 0.51$) journal.

Global diversity and the US

Global diversity with and without the US. The low global diversity in authors and editors as well as the differences between subdisciplines was primarily due to the overrepresentation of the US. Removing the US substantially improved overall diversity (e.g., from 0.76 to 0.93 in authorship, $t(47442) = 70.23, p < 0.001$; 0.58 to 0.90 in editorship, $t(7125.3) = 38.45, p < 0.001$; 0.44 to 0.76 in EiCs, $t(3.1) = 52.61, p = 0.003$; and 0.46 to 0.68 in ownership, $t(1.8) = 38.08, p = 0.08$), and largely eliminated diversity disparity across subdisciplines and between authorship and editorship (**Table 5**).

Overrepresentation of editors relative to authors from the US. At the country level, of the 5,653 editors from 54 countries, 60.3% were from the US, 8.6% from the UK, 5.9% from Canada, and the remaining 25.2% from 52 other countries and regions (of which 13.6% from Europe excluding the UK). Is the editorship representation statistically justifiable based on the authorship representation from each country? That is to say—using an extreme case—when the authors of a journal are all from one country, then to the extent that editors must somehow come from the authors, it can be justified from a statistical point of view to have editors all from that country in that journal. Whether the journal is warranted to have all its authors from just one country in the first place is an important but separate issue in the consideration at the editorship level. Based on this correspondence logic, we can compare shares of authorship with shares of editorship in each country.

Of the 54 countries that had representations in editorship, the US's share of editors substantially outnumbered its share of authors, by 16.2% (**Table 6**), contrasting sharply with most other countries—each having more shares of authors than shares of editors. Similarly, for EiCs, the US's share of EiCs outnumbered its share of authors by 29.3%, whereas most other countries had lower shares of EiCs than shares of authors. Clearly, although the US had the most authorship share in top psychology journals, its shares of editors and EiCs were lopsided and statistically not justified based on the authorship share alone. These results are consistent with the substantial improvements in diversity when the US was excluded above (**Table 5**).

Home country bias

Journal home country bias. Because a journal may disproportionately attract authors and editors from the journal's home country, a potential moderator of authorship and editorship representations in a journal is its country of origin. This geographical tendency—a journal home country bias—was evident in the US, the UK, and five other European countries (**Table 7**). The journal home country bias was stronger for editorship than for authorship: on average, authorship increased by 15.0% for home journals relative to foreign journals, editorship by 22.7%, and EiCs by 36.7%.

Across authorship, editorship, and EiCs, the journal home country bias was substantially more pronounced for journals from the US than those from other regions (**Table 7**). Indeed, as **Table 8** (left) shows, journals from the US had the lowest global diversity in both authorship ($D = 0.66$ vs. 0.74 to 0.92, all $ps < 0.001$) and editorship ($D = 0.46$ vs. 0.73 to 0.90, all $ps < 0.001$).

EiC home country bias. Because EiCs are typically tasked to select EBMs, a natural question concerns whether EBMs are more likely to be from the country of the EiC—that is, an EiC home country bias. For EiCs from the US, 70.4% of EBMs were also located in the US, compared with 34.1% for foreign-EiC journals (i.e., where the EiCs were *not* from the US), a difference of 36.3%. For EiCs from the UK, the proportion of UK EBMs was 27.5% compared with 6.1% in foreign-EiC journals (i.e., where the EiCs were *not* from the UK), a difference of 21.4%. For the rest of the countries (combined due to small samples¹), a similar pattern emerged, with 15.5% same-country EBMs compared with 2.0% in foreign-EiC journals, a difference of 13.5%.

¹ Journals with multiple EiCs who were not in the same country were excluded from analysis. This resulted in six other countries with representations of EiCs (Canada, Spain, Italy, Germany, Belgium, and Switzerland). They were combined due to the small sample sizes.

Thus, as in journal home country bias, EiC home country bias was also more pronounced in the US than in other regions. Indeed, as **Table 8** (right) shows, journals with EiCs from the US had the lowest global diversity in both authorship ($D = 0.66$ vs. 0.83 to 0.94, all $ps < 0.001$) and editorship ($D = 0.50$ vs. 0.64 to 0.91, all $ps < 0.003$).

To test whether the EiC home country bias might be explained by journal country ownership, we separated and compared journals that were owned and not owned by the country of the EiC². The EiC home country bias in authorship was evident regardless of the country ownership of the journal (**Table 9**), both about 14% for journals also owned by the EiC's country and for those owned by other countries. A similar EiC home country bias was observed in EBM's (**Table 10**): 28% for journals also owned by the EiC's country, and 16% for journals owned by other countries.

Discussion

The current study focused on the global diversity in publishing in psychology journals. It is the first comprehensive study that assessed a representative list of top psychology journals and at multiple levels, surveying top psychology journals in ten subdisciplines and examining global diversity in authorship, editorship, and ownership. Three main findings emerge from this body of work, which together provide substantial novel insights into the current landscape of the geographical diversity in psychological science, and have new policy implications for promoting global diversity.

First, by providing a comprehensive and quantitative picture of the global

² Among the eight countries, only five countries—the US, the UK, Spain, Italy, and Switzerland—owned journals. Of them, Spain, Italy, and Switzerland did not have **sufficient** sample sizes, leaving us with the US and the UK for calculations in **Tables 9** and **10**.

distributions of **authors, editors, EiCs, and journal ownership**, the results indicate a lack of global diversity, with the US and, to a much lesser extent, Europe boasting across-the-board outsized influence in top psychology journals, both in **authorship, editorship, and ownership**. Importantly, global disparity intensifies along the hierarchy of authors, editors, EiCs, and journal ownership. And in both authorship and editorship, the degree of global diversity varies substantially across subdisciplines—and, to some degree, across different types of journals.

Second, against this backdrop, removing the US results in a much greater global diversity and also largely eliminates differences in global diversity across subdisciplines and between authorship and editorship. Moreover, the US's share of editorship vastly outnumbers its share of authorship, statistically at the expense of other countries. Indeed, the US is the only country with a substantially larger representation of editorship relative to authorship.

Third, a home country bias emerges for both journal ownership and EiCs. That is, a journal has more authors and editors from the journal's home country relative to a foreign journal. Similarly, a journal has more authors and editors from the EiC's home country relative to a journal with a foreign EiC. The journal and EiC home country biases are most pronounced in the US, such that journals from the US or with US EiCs have the lowest global diversity in authorship and editorship.

Representation and overrepresentation

The overall lack of global diversity in authorship, editorship, and journal ownership begs the question: are some countries—most glaringly, the US—

overrepresented whereas other countries underrepresented? The term “overrepresented” is defined by Merriam-Webster as “*represented excessively (especially: having representatives in a proportion higher than the average)*”, and similarly by Collins as “*represented disproportionately or in too large a number (corresponding to the number in the population, etc.)*”. Yet, the criterion for being excessive or disproportionate is not entirely obvious.

Perhaps it is helpful to draw an analogy from a geographical phenomenon: tropical storms. Known as hurricanes in the US and the Caribbean, but as typhoons in East Asia and cyclones in South Asia, the distribution of tropical storms are far from even. Tropical storms heavily concentrate between 5 and 20 degrees from the equator, with still skewed distributions within these bands. Such disparities arise because tropical storms require several prerequisites, including warm sea temperatures (above 26°C or 79°F) and a certain distance from the equator (i.e., the Coriolis force from earth spinning). As a result, cyclones frequently strike the Philippines but rarely touch Russia, a country about 57 times as large; similarly, within the US, hurricanes routinely hit the east coast, but barely reach the west coast.

Now, is the Philippines overrepresented in the distribution of tropical storms? “Yes” in the sense that it is excessive, disproportionate to the country’s relative area to the earth, but perhaps “no” when based on the area with the prerequisites for tropical storms. In the same vein, is the US overrepresented in the distribution of authorship, editorship, and journal ownership? The answer is a resounding “yes” if the yardstick is *population size*—after all, the US population is only about 4.2% of the total world population in 2022 (a bit higher in the last few decades but not by much). But if the

criterion is the *population with the prerequisites* for authors and editors, then the answer is rather elusive. For unlike tropical storms, the prerequisites for authors and editors are hard to define and the number difficult to properly tally.

These caveats notwithstanding, some evidence appears to indicate that the US had a somewhat bigger share of authors than of psychologists. For example, in 1980, the US accounted for 66% of abstracts indexed by PsycLit³ (Bauserman, 1997), but about half of the world's psychologists as estimated by memberships in national societies that belonged to the International Union of Psychological Science (Rosenzweig, 1984). In 1994, the US accounted for 54% of PsycLit abstracts (Bauserman, 1997) and about 49% of research psychologists who engaged in research as the primary or secondary activity (Rosenzweig, 1992).

Here we sidestep the issue of authorship, but instead focus on editorship. The question is simple: is the editorship representation statistically justifiable based on the authorship representation? We found that, unlike other countries, the US's share of editors outnumbered its share of authors by 16.2% (**Table 6**). Given the zero-sum nature of relative shares, this editorship overrepresentation in the US is at the expense of other countries. In this sense, then, we can say that the US is overrepresented in its share of editorship relative to its share of authorship. Although simplistic and not without assumptions—an issue we expand on in the next section—it is perhaps the best answer we have at this point.

Because humans are not tropical storms, still another interpretation of the term “overrepresented” is based not on examining the population with the prerequisites for

³ PsycLIT was a CD-ROM version of *Psychological Abstracts* published by the APA; it was merged into the PsycINFO online database in 2000.

authors and editors, but on a judgment regarding the *ideal or ecologically diverse distribution*. Suppose the prerequisite for authors and editors is having a PhD degree. Suppose further that the US is the only country granting PhD degrees. Journal authors and editors are then expected to be all from the US. In this situation, even though the US is not overrepresented based on the population with the prerequisites, one may still conclude that the US is overrepresented—in the sense that it is not ideal for the advancement of science, that the distribution is not ecologically diverse. Such judgment is not entirely subjective. Ecologists have long employed quantitative measures to study biodiversity (e.g., Simpson's diversity index, as used in the current work). In this hypothetical example, global diversity would be 0 (the lowest possible diversity, from a range of 0 to 1).

Our results show that the diversity index was 0.76 for authorship, 0.58 for editorship, 0.44 for EiCs, and 0.46 for journal ownership, all far below 1 (full diversity; **Table 5**). Diversity is increased without the US, to 0.93 for authorship, 0.90 for editorship, 0.76 for EiCs, and 0.68 for journal ownership. This finding obviously doesn't mean that psychological science will be better off without the US—far from it—but it is an indication of the dominance of the US on the world stage. In the context of psychological science, currently many countries in Africa, South America, and Asia are vastly underrepresented—their voices and research are almost entirely missing in mainstream psychology journals.

Diversity and historical influences

There are many reasons for low international representations in journal authorship, editorship, and ownership in psychology, but perhaps the most significant one is historical, due to legacy. Psychology as a science was born in Germany in 1870s, with Wilhelm Wundt establishing the first psychological institute in 1879 in Leipzig. But soon after, it spread to other European countries and, in particular, the US. Indeed, by 1900, the US boasted 41 psychological laboratories and 40 doctoral programs, compared with ten laboratories in Europe (Benjamin, 2000). This advantage was further exacerbated by World War II, when many top psychologists in Europe immigrated to the US.

During this period, the English language also was growing its dominance in scientific communications and elsewhere, culminating in becoming the language of science and the dominant lingua franca today. For example, the percentage of articles written in English as indexed by PsycLit was about 87% in 1975 and steadily increased to 93% in 1994 (Bauserman, 1997). Although the past several decades have witnessed significant growth of psychology outside of the US, particularly in Europe and Asia (Bauserman, 1997), the influence of historical legacy cannot be overstated.

Among the influence of this legacy is the ownership of top journals in psychology—72% by the US. Exacerbating this issue is the bias for journals to have more authors and editors from the home country of the journal relative to a foreign journal (a home country bias; **Table 7**). This bias is further compounded by the US being the country with the strongest home country bias—and consequently US journals and journals with US EiCs have the lowest diversity (**Table 8**).

Merits, bias, and “old US club”

It is a curious observation that the US had 44% of authors, but 60% of editors and 73% of EiCs, a pattern of distribution not seen in any other countries, including the UK (**Table 6**). One way to explain the overrepresentation of editorship relative to authorship in the US is based on merits and scholarship. That is, not every author is created equal, and the US could be argued to have proportionally more authors qualified to be editors (i.e., with the “prerequisites”) than any other countries. The overrepresentation of editorship relative to the authorship base could then be statistically justified.

Though prerequisites for editorship are not easy to measure, *citation* data from 1981 to 1994 suggest that, among the top 15 countries that produced the largest total number of publications in science, engineering, and medicine, the US had the highest relative citation impact (i.e., citations divided by publications) in psychology (May, 1997). More recent data show that between 1996 and 2000, citations per publication in psychology were similar between the US and the UK (O’Gorman et al., 2012). Relatedly, because editorship—particularly at the level of EiCs—requires experience and sustained scholarship, *age* plays an undeniable role. Given the relative underdevelopment of psychological science in much of the developing nations, the leading psychological scientists in these countries are both rarer and skew younger than those in the US. That is, there is a problem of even more severe under-representation among the elders of psychology in these countries. For example, notwithstanding rapid growth in psychological research in the past two decades, countries like China and Japan have far fewer internationally renowned senior psychologists compared with the US. Still another factor is the relative English *language* proficiency—a general disadvantage for researchers outside English-speaking countries. However, citation, age, and language can

only play a limited and partial role, as none of them can seem to explain the difference between the US and countries such as the UK.

Indeed, metrics for merits and preeminence in scholarship can be biased. Whether defining scholarship as publication count, citation count, or prestige of the journals published in, there are real concerns that these metrics are biased against authors from outside the US, particularly those from the Majority World (i.e., developing nations). The phenomenon of an “old boy club” in science practice is well documented, particularly in the past (Ceci & Williams, 2011), manifesting as ingroup preferences (favoritism) or network effects (such as insider information). In the context of global diversity, could there be a parallel “old US club”?

The current finding of a home country bias—that journals have more authors and editors from the home country of the journal (relative to a foreign journal) and the home country of the EiC (relative to a journal with a foreign EiC)—that is most pronounced in the US seems to suggest so. Compared with other journals, US journals and journals with US EiCs have the lowest diversity (**Table 8**). Such home country biases at the editor level have important consequences for authorship because editors are more likely to accept manuscripts by authors from the same institutions (by definition, the same country). For example, in economic journals, during the tenure of an editor, graduate students and faculty colleagues of the editor increased the number of articles in that journal by about 14% and 8%, respectively (Colussi, 2018).

Evidence from peer review also points to an “old US club”. That is, reviewers may show a bias against authors from outside the US, particularly those from the Majority World. For example, in evaluating abstracts submitted to the American Heart

Association's Scientific Sessions, reviewers were found to favor authors from the US, English-speaking countries outside the United States, and prestigious academic institutions (see also Peters & Ceci, 1982)—a bias that was substantially reduced in anonymized review (Ross et al., 2006). In economics, groups of economists referee and cite each other's papers and tend to exclude outsiders (Laband & Piette, 1994). Such self-referential behavior reinforces the status quo at the expense of outsiders.

These biases in the publication process combined with biases in other aspects of science practice, it can be argued that the current system bestows cumulative advantages for authors in the US, and cumulative disadvantages for authors in the Majority World. For instance, favoritism may include quid pro quos in promotional activities, such as invitations to give talks and recommendations for awards and joining esteemed societies (Laband & Piette, 1994). Visibility, connection, and prestige can in turn affect publications, citations, and resource allocation. More generally, although underrepresented groups may produce higher rates of scientific novelty, their contributions are devalued and discounted (Hofstra et al., 2020). Thus, even though selection based on publications, citations, and influence seems objective and meritocratic, it ignores many documented biases in science practice that favor authors that are connected and in the US than those in the Majority World. In sum, it can be a vicious cycle for disadvantaged authors.

Disparity, resources, and resource allocation

Although the US currently dominates in authorship, editorship, and ownership in top psychology journals, it is important to contextualize such dominance. First, the US is

less dominant than it used to be—international representations have slowly increased in the past several decades, as evidenced in international authorship and editorship in APA journals (Piocuda et al., 2015; Webster et al., 2021). This shift, however glacial it may seem, is a reflection of the growth of psychology in many other countries (Rosenzweig, 1984; Takooshian et al., 2016).

Second, as alluded to previously, the US dominance in publishing in psychology partly reflects its past and current dominance in producing research psychologists. For instance, in around 1990, the US claimed about 49% share of research psychologists who engaged in research as the primary or secondary activity (Rosenzweig, 1992). Over the past decade, the US has continued to produce several thousand doctorates in psychology each year. What undergirds the flourishing of psychology in the US? In addition to historical factors as noted previously, national wealth plays a crucial role. For example, publications and citations in psychology have been found to be well correlated with income per capita at the national level (O'Gorman et al., 2012). Indeed, for many developing countries, fulfilling basic needs such as food, water, and housing understandably takes precedence over psychological services and research, and thus disciplines such as agriculture and engineering are prioritized over psychology in receiving the already limited resources available.

The importance of national wealth is not limited to psychology but is applicable to the development of science in general. For instance, it is hardly a coincidence that the top four countries with the highest scientific impact—the US, the UK, Germany, and Japan—are also among the wealthiest countries in the world (King, 2004). National wealth helps to establish and maintain a strong university system with well-funded

research infrastructure and personnel. At the same time, it is important to recognize that resource allocation—e.g., to psychology vs. other sciences—can also be idiosyncratic, depending on complex historical and sociocultural factors in each country. For example, although Japan and the UK have comparable national wealth (GDP per capita and GDP) and general scientific impact, curiously, psychology is far less developed in Japan than in the UK (e.g., 0.6% vs. 9.9% in authorship; see **Table 6**).

Policy implications

Given inadequate information regarding the affiliations of reviewers and submitting authors, the current work cannot directly speak to issues related to the reviewing process. Our authorship information is also based on aggregates, and cannot speak to the differences between different levels of authorship, such as first authors, senior authors, and middle authors, although they have been found to be highly consistent with each other (Arnett, 2008; Thalmayer et al., 2021). These limitations notwithstanding, our findings pave the ground for a new policy to promote global diversity, a policy that is not based on numerical targets or equal outcomes. Instead, the goal of the new policy is to identify biased processes and fix those biases, and in doing so, to stimulate the generation of variety.

To this end, perhaps the most critical issue is *awareness and transparency in global diversity*. Currently, despite its importance, the issue of global diversity has not received enough emphasis, both at the research level and at the policy and implementation level. For journals, there should be data collection and analysis in earnest of statistics regarding global diversity, including data on institutional and national

affiliations of handling editors, reviewers, and submitting authors, to better understand factors that affect the fate of submitted manuscripts. Only by doing so can we gain insights into the dynamic relations between editors, reviewers, and authors, which is necessary for evaluating disparity and potential biases. And only then can we devise more effective strategies and policies to combat those biases.

Given the documented lack of editors from diverse global backgrounds and given the vital role of EiCs, journals should consider *promoting researchers from under-represented countries to journal leadership positions*, including associate editors and EiCs. These editors would be an asset to advancing a global psychological science of human beings—their familiarity with the local environmental, social, and economic context and constraints would be invaluable in discovering and promoting high-quality research sidelined in current psychological science.

In suggesting so, we are not advocating a numerical diversity target. Try as one might, it is not clear what numerical targets one should prescribe for *Journal of Black Psychology* or *Psychology of Women Quarterly*, to name two examples. Indeed, we are against a fixed quota or superficial balanced or equal representations. Equal outcomes are neither natural nor necessarily healthy, considering the unequal development of psychological science around the globe discussed above. Instead, journals should have the needed autonomy and flexibility to achieve their goals and vision. Nonetheless, it is important for journals to at least consider their international distributions of authors and implement procedures to ensure adequate international representations of editorship.

A practical concern about venturing out to the non-English speaking regions is the English proficiency of researchers there. Several countries now boast a sizable number of

psychological scientists who were trained and/or have worked in English-speaking countries, including China, South Korea, and Japan. For example, over the past decade, China has established quite a few independent university campuses of foreign origins—including the Shenzhen campus of the Chinese University of Hong Kong and the Shanghai campus of New York University—where English is the official teaching language. In general, researchers from these universities and other top universities would be a good pool of candidates. To minimize favoritism, we suggest journals *earmark some editorial positions for researchers from non-English speaking countries*. An application-based process can be established to select the best candidates for some of these positions. Journals may also collaborate with the International Union of Psychological Science to facilitate the search for talented researchers that are otherwise not highly visible in the Western world. *Indeed, if EiCs are willing to move beyond the availability heuristic, they can find people who are more than qualified for these editorial positions around the world. For example, in the premier journal *Personality and Social Psychology Review* in 2022, under the new EiC (Jonathan Adler), “the incoming Editorial Board includes scholars from every continent (except Antarctica)” (Adler, 2022).*

We emphasize the important role of the US, the UK, and other countries with well-developed psychological research in *training and nurturing students and researchers from countries with under-developed psychology*. These students and researchers bring different perspectives to research, and some eventually become part of a diverse workforce in psychology, wherever they decide to pursue their careers. Indeed, for example, out of nine tenure-track faculty in our small psychology unit at CUHKSZ, six received their PhDs from the US, two from Hong Kong, and one from Macau. It is not

a coincidence that most active psychologists and neuroscientists in China today were trained and/or have worked abroad. The proliferation of psychological scientists around the globe after training and work experience in regions with well-developed psychology is kudos to these regions, including the US. It is in this spirit that visa restrictions for foreign students and researchers should be minimized in an effort to promote global exchanges and to build a more representative psychological science.

Relatedly, other avenues to improve global diversity include *facilitating international collaborations and other exchanges*, particularly between countries in different stages of development in psychological science and between countries with different cultures and customs. Such collaborations and exchanges have the promise to improve research in both parties, and can help to nurture the next generation of psychological scientists in the Majority World, who ultimately are the face of a diverse future. These can take diverse forms, from giving lectures and providing feedback to writing joint grant proposals and conducting collaborative research.

Finally, given the importance of journal ownership, when circumstances favor such decisions, it can also be valuable to *establish and develop journals in under-represented countries*. Some examples include *PsyCh Journal*, *Eye and Vision*, and *Journal of Pacific Rim Psychology*, although the success of such journals will need to await the test of time. Keys to success will include building and maintaining an efficient and objective editorial process, being responsive to changing directions and needs in research and publishing, and a general commitment to excellence in publishing, from copyediting to visualization. But researchers can help by providing timely and objective

peer reviews for manuscripts, promoting interesting and important research published in these less-visible venues, and considering sending their research for publications there.

Summary and Conclusion

Global diversity is essential to advancing a true psychological science of human beings. It helps to promote epistemological plurality, enrich the repertoire of psychological phenomena, expose distinct as well as nuanced manifestations across different sociocultural contexts, and is the utmost fertile ground for developing generalizations and external validity. By examining global diversity of top psychology journals across multiple subdisciplines and at multiple levels of the hierarchy (authorship, editorship, journal ownership), we were able to gain substantial novel insights into the current landscape of the geographical diversity in psychology, including distribution characteristics and influencing factors.

First, for global distributions, not only do different subdisciplines (and different journal types) vary substantially in global diversity, but that along the hierarchy of authors, editors, EiCs, and journal ownership, the disparity between countries becomes more severe. Of all the countries, only the US has a substantially larger share of editors than its share of authors. Removing the US markedly increases the overall diversity index and eliminates differences in diversity across subdisciplines and between authorship and editorship. Second, for influencing factors, notably more authors and editors come from the journal's home country compared with a foreign journal—a journal home country bias. Similarly, more authors and editors come from the EiC's home country compared with a journal with a foreign EiC—an EiC home country bias. These home country biases

are most pronounced in the US such that journals from the US or with US EiCs have the lowest global diversity in authorship and editorship.

These findings on the distribution characteristics and influencing factors of global diversity bear implications for a new policy to promote diversity and variety. Actions include: 1) drafting working plans to increase awareness and transparency in global diversity; 2) promoting researchers from under-represented countries to journal leadership positions; 3) ensuring adequate global representations of editorship in journals relative to authorship; 4) earmarking some editorial positions for researchers from non-English speaking countries; 5) training and nurturing students and researchers from countries with under-developed psychology; 6) facilitating international collaborations and other exchanges; and 7) establishing and developing journals in under-represented countries. As the most dominant force in psychology, the US—which may be considered overrepresented based on population size, the size of research psychologists, and measures of ecological diversity—can do a lot to improve the global diversity of psychology. It has done so in the past (e.g., student training). But much more can and should be done if we are serious about promoting a psychological science of *Homo sapiens*.

References

- Adler, J. M. (2022). The next chapter at PSPR. *Personality and Social Psychology Review*. <https://doi.org/10.1177/10888683211071122>
- Arnett, J. J. (2008). The neglected 95%: why American psychology needs to become less American. *Am Psychol*, 63(7), 602-614. <https://doi.org/10.1037/0003-066X.63.7.602>
- Bauserman, R. (1997). International representation in the psychological literature. *International Journal of Psychology*, 32(2), 107-112. <https://doi.org/10.1080/002075997400908>

- Bayani, A. A., Esmaeili, R., & Ganji, G. (2020). The impact of fasting on the psychological well-being of muslim graduate students. *Journal of Religion & Health*, 59(6), 3270-3275. <https://doi.org/10.1007/s10943-018-00740-3>
- Bell, S. T., Villado, A. J., Lukasik, M. A., Belau, L., & Briggs, A. L. (2011). Getting specific about demographic diversity variable and team performance relationships: A meta-analysis. *Journal of Management*, 37(3), 709-743. <https://doi.org/10.1177/0149206310365001>
- Benjamin, L. T. (2000). The psychology laboratory at the turn of the 20th century. *American Psychologist*, 55(3), 318-321. <https://doi.org/10.1037/0003-066x.55.3.318>
- Berkowitz, L., & Donnerstein, E. (1982). External validity is more than skin deep: Some answers to criticisms of laboratory experiments. *American Psychologist*, 37(3), 245-257. <https://doi.org/10.1037/0003-066x.37.3.245>
- Brower, J. E., Zar, J. H., & Ende, C. v. (1998). *Field and laboratory methods for general ecology* (4th ed.). WCB McGraw-Hill. <http://www.loc.gov/catdir/description/mh023/97015263.html>
- Burnette, D., Sun, J. J., & Sun, F. (2013). A comparative review of grandparent care of children in the U.S. and China. *Ageing International*, 38(1), 43-57. <https://doi.org/10.1007/s12126-012-9174-z>
- Burt, R. S. (2004). Structural holes and good ideas. *American Journal of Sociology*, 110(2), 349-399. <https://doi.org/10.1086/421787>
- Carlsson, M., Finseraas, H., Midtbøen, A. H., & Rafnsdóttir, G. L. (2021). Gender bias in academic recruitment? Evidence from a survey experiment in the nordic region. *European Sociological Review*, 37(3), 399-410.
- Ceci, S. J., Ginther, D. K., Kahn, S., & Williams, W. M. (2014). Women in academic science: A changing landscape. *Psychol Sci Public Interest*, 15(3), 75-141. <https://doi.org/10.1177/1529100614541236>
- Ceci, S. J., & Williams, W. M. (2011). Understanding current causes of women's underrepresentation in science. *Proceedings of the National Academy of Sciences of the United States of America*, 108(8), 3157-3162. <https://doi.org/10.1073/pnas.1014871108>
- Chen, F., Short, S. E., & Entwisle, B. (2000). The impact of grandparental proximity on maternal childcare in China. *Population Research and Policy Review*, 19(6), 571-590. <https://doi.org/10.1023/A:1010618302144>
- Chen, F. N., & Liu, G. Y. (2012). The health implications of grandparents caring for grandchildren in China. *Journals of Gerontology Series B-Psychological Sciences and Social Sciences*, 67(1), 99-112. <https://doi.org/10.1093/geronb/gbr132>
- Cheon, B. K., Melani, I., & Hong, Y. Y. (2020). How USA-centric is psychology? An archival study of implicit assumptions of generalizability of findings to human nature based on origins of study samples. *Social Psychological and Personality Science*, 11(7), 928-937. <https://doi.org/10.1177/1948550620927269>
- Choi, S. W. E., & Zhang, Z. M. (2021). Caring as curing: Grandparenting and depressive symptoms in China. *Social Science & Medicine*, 289. <https://doi.org/10.1016/j.socscimed.2021.114452>
- Christopher, J. C., Wendt, D. C., Marecek, J., & Goodman, D. M. (2014). Critical cultural awareness: contributions to a globalizing psychology. *Am Psychol*, 69(7), 645-655.

- <https://doi.org/10.1037/a0036851>
- Colussi, T. (2018). Social ties in academia: A friend is a treasure. *Review of Economics and Statistics*, 100(1), 45-50. https://doi.org/10.1162/REST_a_00666
- Espin, J., Palmas, S., Carrasco-Rueda, F., Riemer, K., Allen, P. E., Berkebile, N., . . . Bruna, E. M. (2017). A persistent lack of international representation on editorial boards in environmental biology. *Plos Biology*, 15(12). <https://doi.org/10.1371/journal.pbio.2002760>
- Fan, F., Su, L. Y., Gill, M. K., & Birmaher, B. (2010). Emotional and behavioral problems of Chinese left-behind children: a preliminary study. *Social Psychiatry and Psychiatric Epidemiology*, 45(6), 655-664. <https://doi.org/10.1007/s00127-009-0107-4>
- Fellmeth, G., Rose-Clarke, K., Zhao, C., Busert, L. K., Zheng, Y., Massazza, A., . . . Devakumar, D. (2018). Health impacts of parental migration on left-behind children and adolescents: a systematic review and meta-analysis. *Lancet*, 392(10164), 2567-2582. [https://doi.org/10.1016/S0140-6736\(18\)32558-3](https://doi.org/10.1016/S0140-6736(18)32558-3)
- Gilavand, A., & Fatahiasl, J. (2018). Studying effect of fasting during ramadan on mental health of university students in iran: A review. *Journal of Research in Medical and Dental Science*, 6(2), 205-209. <https://doi.org/10.24896/jrmds.20186232>
- Gruber, J., Mendle, J., Lindquist, K. A., Schmader, T., Clark, L. A., Bliss-Moreau, E., . . . Williams, L. A. (2021). The future of women in psychological science. *Perspect Psychol Sci*, 16(3), 483-516. <https://doi.org/10.1177/1745691620952789>
- Hammer, Ø., Harper, D. A. T., & Ryan, P. D. (2001). PAST: Paleontological statistics software package for education and data analysis. *Palaeontologia Electronica*, 4(1), 1-9.
- Heine, S. J. (2016). *Cultural psychology*. W.W. Norton & Company.
- Henrich, J., Heine, S. J., & Norenzayan, A. (2010). The weirdest people in the world? *Behavioral and Brain Sciences*, 33(2-3), 61-83; discussion 83-135. <https://doi.org/10.1017/S0140525X0999152X>
- Hodgson, G. M., & Rothman, H. (1999). The editors and authors of economics journals: A case of institutional oligopoly? *Economic Journal*, 109(453), F165-F186.
- Hofstra, B., Kulkarni, V. V., Munoz-Najar Galvez, S., He, B., Jurafsky, D., & McFarland, D. A. (2020). The diversity-innovation paradox in science. *Proc Natl Acad Sci U S A*, 117(17), 9284-9291. <https://doi.org/10.1073/pnas.1915378117>
- Jager, J., Putnick, D. L., & Bornstein, M. H. (2017). II. More than just convenient: The scientific merits of homogeneous convenience samples. *Monographs of the Society for Research in Child Development*, 82(2), 13-30. <https://doi.org/10.1111/mono.12296>
- Jingzhong, Y., & Lu, P. (2011). Differentiated childhoods: impacts of rural labor migration on left-behind children in China. *J Peasant Stud*, 38(2), 355-377. <https://doi.org/10.1080/03066150.2011.559012>
- King, D. A. (2004). The scientific impact of nations. *Nature*, 430(6997), 311-316. <https://doi.org/10.1038/430311a>
- Laband, D. N., & Piette, M. J. (1994). Favoritism versus search for good papers: empirical-evidence regarding the behavior of journal editors. *Journal of Political Economy*, 102(1), 194-203. <https://doi.org/10.1086/261927>
- Landers, R. N., & Behrend, T. S. (2015). An inconvenient truth: Arbitrary distinctions

- between organizational, mechanical turk, and other convenience samples. *Industrial and Organizational Psychology: Perspectives on Science and Practice*, 8(2), 142-164. <https://doi.org/10.1017/iop.2015.13>
- Li, Q., Liu, G., & Zang, W. (2015). The health of left-behind children in rural China. *China Economic Review*, 36, 367-376. <https://doi.org/10.1016/j.chieco.2015.04.004>
- Llorens, A., Tzovara, A., Bellier, L., Bhaya-Grossman, I., Bidet-Caulet, A., Chang, W. K., . . . Dronkers, N. F. (2021). Gender bias in academia: A lifetime problem that needs solutions. *Neuron*, 109(13), 2047-2074. <https://doi.org/10.1016/j.neuron.2021.06.002>
- Markus, H. R., & Kitayama, S. (1991). Culture and the self: Implications for cognition, emotion, and motivation. *Psychological Review*, 98(2), 224-253. <https://doi.org/10.1037/0033-295x.98.2.224>
- May, R. M. (1997). The scientific wealth of nations. *Science*, 275(5301), 793-796. <https://doi.org/10.1126/science.275.5301.793>
- Metcalfe, J. S. (1994). Evolutionary economics and technology policy. *Economic Journal*, 104(425), 931-944. <https://doi.org/10.2307/2234988>
- Milfont, T. L., & Fischer, R. (2010). Testing measurement invariance across groups: Applications in cross-cultural research. *International Journal of Psychological Research*, 3(1), 111-121.
- Mitchell, G. (2012). Revisiting truth or triviality: The external validity of research in the psychological laboratory. *Perspectives on Psychological Science*, 7(2), 109-117. <https://doi.org/10.1177/1745691611432343>
- Myers, L. J., Lodge, T., Speight, S. L., & Haggins, K. (2021). The necessity of an emic paradigm in psychology. *Journal of Humanistic Psychology*. <https://doi.org/10.1177/00221678211048568>
- O'Gorman, J., Shum, D. H., Halford, W. K., & Ogilvie, J. (2012). World trends in psychological research output and impact. *International Perspectives in Psychology*, 1(4), 268-283.
- Palser, E. R., Lazerwitz, M., & Fotopoulou, K. (2021). Gender and geographical disparity in editorial boards of journals in psychology and neuroscience. *bioRxiv*.
- Peters, D. P., & Ceci, S. J. (1982). Peer-review practices of psychological journals: the fate of accepted, published articles, submitted again. *Behavioral and Brain Sciences*, 5(2), 187-195. <https://doi.org/10.1017/S0140525x00011183>
- Petersen, A. M. (2019). Megajournal mismanagement: Manuscript decision bias and anomalous editor activity at PLOS ONE. *Journal of Informetrics*, 13(4). <https://doi.org/10.1016/j.joi.2019.100974>
- Piocuda, J. E., Smyers, J. O., Knyshev, E., Harris, R. J., & Rai, M. (2015). Trends of internationalization and collaboration in US psychology journals 1950–2010. *Archives of Scientific Psychology*, 3(1), 82-92. <https://doi.org/10.1037/arc0000020>
- Rad, M. S., Martingano, A. J., & Ginges, J. (2018). Toward a psychology of Homo sapiens: Making psychological science more representative of the human population. *Proc Natl Acad Sci U S A*, 115(45), 11401-11405. <https://doi.org/10.1073/pnas.1721165115>
- Rivera, L. A. (2017). When two bodies are (not) a problem: Gender and relationship status discrimination in academic hiring. *American Sociological Review*, 82(6), 1111-1138. <https://doi.org/10.1177/0003122417739294>

- Roberts, S. O., Bareket-Shavit, C., Dollins, F. A., Goldie, P. D., & Mortenson, E. (2020). Racial inequality in psychological research: Trends of the past and recommendations for the future. *Perspect Psychol Sci*, 15(6), 1295-1309. <https://doi.org/10.1177/1745691620927709>
- Rosenzweig, M. R. (1984). U.S. psychology and world psychology. *American Psychologist*, 39(8), 877-884.
- Rosenzweig, M. R. (1992). Psychological Science around the World. *American Psychologist*, 47(6), 718-722. <https://doi.org/10.1037/0003-066x.47.6.718>
- Ross, J. S., Gross, C. P., Desai, M. M., Hong, Y. L., Grant, A. O., Daniels, S. R., . . . Krumholz, H. M. (2006). Effect of blinded peer review on abstract acceptance. *JAMA*, 295(14), 1675-1680. <https://doi.org/10.1001/jama.295.14.1675>
- Simpson, E. H. (1949). Measurement of diversity. *Nature*, 163(4148), 688-688.
- Sue, S. (1999). Science, ethnicity, and bias: where have we gone wrong? *Am Psychol*, 54(12), 1070-1077. <https://doi.org/10.1037/0003-066x.54.12.1070>
- Sun, X. J., Tian, Y., Zhang, Y. X., Xie, X. C., Heath, M. A., & Zhou, Z. K. (2015). Psychological development and educational problems of left-behind children in rural China. *School Psychology International*, 36(3), 227-252. <https://doi.org/10.1177/0143034314566669>
- Takooshian, H., Gielen, U. P., Plous, S., Rich, G. J., & Velayo, R. S. (2016). Internationalizing undergraduate psychology education: Trends, techniques, and technologies. *Am Psychol*, 71(2), 136-147. <https://doi.org/10.1037/a0039977>
- Thalmayer, A. G., Toscanelli, C., & Arnett, J. J. (2021). The neglected 95% revisited: Is American psychology becoming less American? *Am Psychol*, 76(1), 116-129. <https://doi.org/10.1037/amp0000622>
- Wang, L., & Mesman, J. (2015). Child development in the face of rural-to-urban migration in China: A meta-analytic review. *Perspect Psychol Sci*, 10(6), 813-831. <https://doi.org/10.1177/1745691615600145>
- Webster, G. D., Mahar, E. A., & Wongsomboon, V. (2021). American psychology is becoming more international, but too slowly: Comment on Thalmayer et al. (2020). *American Psychologist*, 76(5), 802-805. <https://doi.org/10.1037/amp0000747>
- Williams, W. M., & Ceci, S. J. (2015). National hiring experiments reveal 2:1 faculty preference for women on STEM tenure track. *Proc Natl Acad Sci U S A*, 112(17), 5360-5365. <https://doi.org/10.1073/pnas.1418878112>

Table 1. Top 68 journals in SCIE and SSCI based on journal impact factors (JIF)

Journal	Category	Type	JIF	Country
Psychological Bulletin	SCIE; multidisciplinary	R	20.8	US
Annual Review of Psychology	SCIE; multidisciplinary	R	18.1	US
Psychotherapy and Psychosomatics	SCIE	E	14.9	Switzerland
Annual Review of Clinical Psychology	SCIE; clinical	R	13.7	US
Journal of Child Psychology and Psychiatry	SCIE; developmental	E	7.0	UK
Psychological Review	SCIE; multidisciplinary	R	6.8	US
Psychological Medicine	SCIE; clinical	E	5.8	UK
Depression and Anxiety	SCIE; clinical	E	4.7	US
Journal of Memory and Language	SCIE; experimental	E	3.9	US
International Review of Sport and Exercise Psychology	Applied	R	14.3	UK
Annual Review of Organizational Psychology and Organizational Behavior	Applied	R	10.8	US
Journal of Management	Applied	E	8.9	US
Journal of Occupational Health Psychology	Applied	E	7.3	US
Leadership Quarterly	Applied	E	6.6	US
Personnel Psychology	Applied	E	6.6	US
Journal of Applied Psychology	Applied	E	5.8	US
Organizational Research Methods	Applied	M	5.7	US
Journal of Organizational Behavior	Applied	E	5.0	US
Behavioral and Brain Sciences	Biological	R	17.3	UK
Psychophysiology	Biological	E	3.7	US
Clinical Psychology Review	Clinical	R	10.3	UK
Journal of Abnormal Psychology	Clinical	E	6.5	US
Clinical Psychology-Science and Practice	Clinical	R	5.5	US

Clinical Psychological Science	Clinical	E	5.4	US
Health Psychology Review	Clinical	R	5.1	Europe
Neuropsychology Review	Clinical	R	4.8	US
Journal of Consulting and Clinical Psychology	Clinical	E	4.6	US
Behaviour Research and Therapy	Clinical	E	4.5	UK
Cognitive Behaviour Therapy	Clinical	E	4.4	Sweden
International Journal of Clinical and Health Psychology	Clinical	E	4.3	Spain
Journal of the American Academy of Child and Adolescent Psychiatry	Developmental	E	6.9	US
Developmental Cognitive Neuroscience	Developmental	E	5.0	US
Child Development	Developmental; educational	E	4.9	US
Child Development Perspectives	Developmental	R	4.6	US
Autism	Developmental	E	4.6	UK
Journal of Adolescent Health	Developmental	E	4.0	US
European Child & Adolescent Psychiatry	Developmental	E	3.9	Europe
Educational Psychology Review	Educational	R	5.2	US
Journal of Educational Psychology	Educational	E	5.0	US
Educational Psychologist	Educational	R	4.5	US
Journal of Counseling Psychology	Educational	E	3.7	US
Journal of the Learning Sciences	Educational	E	3.6	US
Trends in Cognitive Sciences	Experimental	R	15.2	US
Advances in Experimental Social Psychology	Experimental; social	R	6.6	US
Computers in Human Behavior	Experimental; multidisciplinary	E	5.0	UK
Behavior Research Methods	Experimental; mathematical	M	4.4	US
Cortex	Experimental	E	4.0	Italy
Current Opinion in Behavioral Sciences	Experimental	R	4.0	Netherlands

Psychonomic Bulletin & Review	Experimental; mathematical	E	3.9	US
Developmental Science	Experimental	E	3.7	UK
Psychological Science in the Public Interest	Multidisciplinary	R	18.3	US
Psychological Inquiry	Multidisciplinary	R	9.9	UK
Psychological Methods	Multidisciplinary	M	8.4	US
Perspectives on Psychological Science	Multidisciplinary	R	8.3	US
American Psychologist	Multidisciplinary	E	6.5	US
Psychological Science	Multidisciplinary	E	5.4	US
Environment and Behavior	Multidisciplinary	E	5.1	US
Current Directions in Psychological Science	Multidisciplinary	R	5.1	US
European Journal of Psychology Applied to Legal Context	Multidisciplinary	E	4.9	Spain
Annals of Behavioral Medicine	Multidisciplinary	E	4.5	US
Journal of the American Psychoanalytic Association	Psychoanalysis	E	1.0	US
Psychoanalytic Psychology	Psychoanalysis	E	1.0	US
Personality and Social Psychology Review	Social	R	12.3	US
Social Issues and Policy Review	Social	R	8.9	US
Journal of Personality and Social Psychology	Social	E	6.3	US
Social Psychological and Personality Science	Social	E	4.4	US
European Journal of Personality	Social	E	3.9	Europe
Journal of Personality	Social	E	3.7	US

Note: Journal categories are based on Science Citation Index Expanded (SCIE; one category) and the Social Sciences Citation Index (SSCI; 10 categories); Journal impact factors (JIFs) are based on the JCR 2020 edition; journal types are based on being outlets primarily for review articles (R), empirical articles (E), or methods articles (M).

Empirical	31589	15098	2499	10388	254	16769	317	1362
	(0.75)	(42.3)	(7.8)	(37.1)	(0.8)	(48.0)	(1.4)	(5.0)
Method	1150	380	89	549	10	451	11	40
	(0.86)	(38.9)	(7.2)	(43.1)	(0.8)	(44.3)	(0.8)	(3.8)
Review	5062	2241	260	1879	13	2545	15	350
	(0.77)	(48.2)	(4.4)	(32.0)	(0.2)	(55.1)	(0.3)	(8.0)
Total	37801	17719	2848	12816	277	19765	343	1752
	(0.76)	(44.1)	(6.6)	(35.7)	(0.6)	(50.2)	(1.0)	(5.9)

Note. Proportions (%) are based on journal average. *D* (second column in parentheses)

represents Simpson's diversity index (0 to 1, higher representing better diversity).

Table 3. Global distribution of the national affiliations of 5,653 editors in top 68 journals across six continents (the US is listed separately)

Category	Total	US	Asia	Europe	Africa	North America	South America	Oceania
& Type	<i>N (D)</i>	<i>N (%)</i>	<i>N (%)</i>	<i>N (%)</i>	<i>N (%)</i>	<i>N (%)</i>	<i>N (%)</i>	<i>N (%)</i>
<hr/>								
Category								
Applied	1502	1001.5	95	255.5	1	1067.5	5	78
	(0.54)	(59.8)	(6.7)	(23.1)	(0)	(65.2)	(0.4)	(4.7)
Biological	98	58	7	23	0	61	0	7
	(0.63)	(62.4)	(4.1)	(24.1)	(0)	(64.1)	(0.0)	(7.7)
Clinical	956	615.5	21	213.5	0	663.5	2	56
	(0.57)	(64.3)	(2.1)	(22.7)	(0)	(69.7)	(0.3)	(5.2)
Developmental	505	248	22	176.5	6	274	7	19.5
	(0.71)	(48.8)	(5.1)	(34.1)	(0.7)	(55.2)	(1.6)	(3.4)
Educational	517	371	28	79	0	390	1	19
	(0.48)	(71.3)	(6.4)	(13.7)	(0)	(76.2)	(0.2)	(3.5)
Experimental	440	201	26	174	0	226	0	14
	(0.75)	(46.3)	(5.7)	(35.0)	(0)	(56.6)	(0.0)	(2.7)
Mathematical	122	72	6	35	0	77	0	4
	(0.63)	(57.1)	(5.0)	(30.1)	(0)	(61.4)	(0.0)	(3.5)
Multidisciplinary	833	622.5	22.5	133	0	655.5	2	20
	(0.43)	(69.4)	(2.7)	(20.2)	(0)	(73.7)	(0.8)	(2.7)
Psychoanalysis	126	118	0	6	1	119	0	0
	(0.12)	(93.7)	(0)	(4.8)	(0.8)	(94.4)	(0.0)	(0.0)
Social	712	393	23	199	1	468	1	20
	(0.67)	(49.5)	(1.8)	(27.6)	(0)	(65.8)	(0.0)	(4.7)
Type								

Empirical	4542	2893.5	199.5	1030	9	3121.5	14	168
	(0.58)	(58.8)	(4.0)	(28.2)	(0.2)	(63.8)	(0.5)	(3.3)
Method	221	154	4	44	0	161	1	11
	(0.51)	(68.4)	(2.1)	(21.7)	(0)	(71.8)	(0.3)	(4.1)
Review	890	554	38	182.5	0	611	4	54.5
	(0.59)	(61.9)	(4.2)	(20)	(0)	(70.0)	(0.6)	(5.1)
Total	5653	3601.5	241.5	1256.5	9	3893.5	19	233.5
	(0.58)	(60.3)	(4.0)	(25.1)	(0.1)	(66.3)	(0.5)	(4.0)

Note: Proportions (%) are based on journal average. *D* (second column in parentheses)

represents Simpson's diversity index (0 to 1, higher representing better diversity).

Table 4. Global distribution of editors-in-chief (EiCs) and journal ownership of the top 68 journals in ten psychological subdisciplines

Country	EiC		Journal ownership	
	Count	Ratio (%)	Count	Ratio (%)
US	49.2	73.4	49	72.1
UK	6.8	10.2	10	14.7
Canada	3	4.5	—	—
Spain	2	3.0	2	2.9
Australia	1	1.5	—	—
Belgium	1	1.5	—	—
Germany	1	1.5	—	—
Italy	1	1.5	1	1.5
Sweden	1	1.5	1	1.5
Switzerland	0.5	0.8	1	1.5
Netherlands	0.5	0.8	1	1.5
Unclassified/Europe*	—	—	3	4.4

Note. All EiCs of a journal count as one, such that for journals with more than one EiC, the weight for each EiC is divided by the total number of EiCs in that journal. *Three journals belong to European Association of Personality Psychology, European Society for Child and Adolescent Psychiatry, and European Health Psychology Society, which were coded as “Europe” instead of a specific country due to unclear country of origin.

Table 5. Changes in the overall Simpson's diversity index (D) and its range in ten subdisciplines after removing the US in authorship, editorship, editors-in-chief (EiCs), and ownership

US impact	Simpson's diversity index (D)			
	Author	Editor	EiC	Ownership
With the US				
Overall	0.76	0.58	0.44	0.46
Subdiscipline range	0.44–0.87	0.12–0.75	—	—
Without the US				
Overall	0.93	0.90	0.76	0.68
Subdiscipline range	0.91–0.93	0.78–0.91	—	—

Note: Simpson's diversity index ranges from 0 to 1, higher representing better diversity.

Table 6. Proportions of authors, editors, and editors-in-chief (EiCs)—as well as their differences—in twenty countries that had at least 0.5% of authorship representation in top 68 journals in psychology

Country	Author (%)	Editor (%)	EiC (%)	Editor – Author (%)	EiC – Author (%)
US	44.1	60.3	73.4	16.2	29.3
UK	9.9	8.6	10.2	-1.3	0.3
Germany	5.9	3.8	1.5	-2.1	-4.4
Canada	5.8	5.9	4.5	0.1	-1.3
Australia	5.3	3.4	1.5	-1.8	-3.8
Netherlands	5.0	3.9	0.8	-1.2	-4.2
Spain	2.6	2.0	3.0	-0.6	0.4
China*	2.1	1.0	0.0	-1.0	-2.1
Belgium	1.7	0.9	1.5	-0.8	-0.2
Switzerland	1.6	0.8	1.5	-0.9	-0.1
Italy	1.6	1.2	1.5	-0.3	-0.1
France	1.5	0.9	0.0	-0.6	-1.5
Israel	1.3	1.0	0.0	-0.4	-1.3
Sweden	1.2	0.8	0.8	-0.3	-0.4
Norway	0.9	0.2	0.0	-0.7	-0.9
New Zealand	0.7	0.6	0.0	-0.1	-0.7
Denmark	0.6	0.3	0.0	-0.3	-0.6
Japan	0.6	0.5	0.0	0.0	-0.6

Singapore	0.6	0.7	0.0	0.1	-0.6
Finland	0.5	0.4	0.0	-0.2	-0.5

Note: Proportions are based on journal averages. Overrepresentations are in bold. *Data in China included mainland China, Hong Kong, and Macau (excluding Taiwan).

Table 7. Journal home country bias in authors, editors, and editors-in-chief (EiCs)

Country or region	Author (%)			Editor (%)			EiC (%)		
	Home journal	Foreign journal	Home country bias	Home journal	Foreign journal	Home country bias	Home journal	Foreign journal	Home country bias
US	50.4	28.0	22.4	70.4	34.3	36.1	89.6	32.5	57.1
UK	16.5	8.4	8.1	22.1	5.7	16.4	28.3	4.6	23.7
Mainland Europe	16.5	2.0	14.5	16.8	1.3	15.5	30.0	0.8	29.2

Note: The journal home country bias is the difference between home journals and foreign journals in the proportions of authors, editors, and EiCs from the home country.

Proportions are based on journal average. Data in mainland Europe include five countries with six journals total.

Table 8. Simpson's diversity index (*D*) in authorship and editorship as a function of the journal's home country and EiC's home country

Home country or region	Under different journal home countries		Under different EiC home countries	
	Author (<i>D</i>)	Editor (<i>D</i>)	Author (<i>D</i>)	Editor (<i>D</i>)
US	0.66	0.49	0.66	0.50
UK	0.87	0.75	0.84	0.81
Canada	—	—	0.89	0.64
Spain	0.83	0.73	0.83	0.73
Belgium	—	—	0.88	0.81
Germany	—	—	0.94	0.91
Italy	0.89	0.87	0.92	0.90
Sweden	0.79	0.80	—	—
Switzerland	0.92	0.90	0.83	0.73
Netherlands	0.74	0.81	—	—
Unclassified/Europe*	0.92	0.90	—	—
More than one country**	—	—	0.87	0.68

Note: Diversity index is based on exact counts to facilitate statistical comparisons.

Simpson's diversity index (*D*) ranges from 0 to 1, higher representing better diversity.

*The owner region of three journals is coded as Europe instead of a specific country due to unclear country of origin (European Association of Personality Psychology, European Society for Child and Adolescent Psychiatry, and European Health Psychology Society).

**Eleven journals have multiple EiCs (or its EiC has affiliations in more than one country).

Table 9. Editor-in-chief (EiC) home country bias on authorship as a function of journal country ownership

Journals	US authorship (%)			UK authorship (%)		
	US	Non-US	Home	UK	Non-UK	Home
	EiC	EiC	country bias	EiC	EiC	country bias
US-owned	52.4	33.6	18.8	—	—	—
Not US-owned	36.5	23.3	13.2	—	—	—
UK-owned	—	—	—	22.6	13.6	9.0
Not UK-owned	—	—	—	21.5	7.7	13.8

Note: The EiC home country bias is the difference between home-EiC journals and foreign-EiC journals in the proportions of authors from the EiC's country. Proportions are based on journal average.

Table 10. Editor-in-chief (EiC) home country bias on editorial board members (EBMs) as a function of journal country ownership

Journals	US EBMs (%)			UK EBMs (%)		
	US	Non-US	Home	UK	Non-UK	Home
	EiC	EiC	country bias	EiC	EiC	country bias
US-owned	72.0	46.9	25.1	—	—	—
Not US-owned	48.7	30.3	18.4	—	—	—
UK-owned	—	—	—	43.4	12.9	30.5
Not UK-owned	—	—	—	18.8	4.8	14.0

Note: The EiC home country bias is the difference between home-EiC journals and foreign-EiC journals in the proportions of EBMs from the EiC's country. Proportions are based on journal average.