

The Authors of Economics Journals Revisited: Evidence from a Large-Scale Replication of Hodgson & Rothman (1999)

**Matthias Aistleitner, Jakob Kapeller
and Dominik Kronberger**

May 2022

The Authors of Economics Journals Revisited: Evidence from a Large-Scale Replication of Hodgson & Rothman (1999)[#]

Working Paper

Matthias Aistleitner¹

Jakob Kapeller^{1,2*}

Dominik Kronberger¹

Abstract. In this paper, we present results from of a large-scale replication of Hodgson and Rothman's (1999) seminal analysis of the institutional and geographical concentration of authors publishing in top economic journals. We analyze bibliometric data of more than 49.000 articles published in a set of 30 highly influential economic journals between 1990 and 2018. Based on a random sample of 3.253 authors, we further analyze the PhD-granting institutions of the authors under study to better scrutinize the claim of an institutional oligopoly. The findings confirm the long-term persistence of strong oligopolistic structures in terms of both, author affiliations as well as PhD-granting institutions.

Keywords: sociology of economics, bibliometrics, concentration in science, replication study

JEL Codes: A14, B20

[#] The authors wish to thank participants of the SASE annual conference 2021, the EAEPE annual conference 2021 and the ICAE Research Seminar (January 2021) for comments on earlier versions of this paper. M. A. and D. K. acknowledge funding by the Austrian Science Fund (FWF) under the grant number ZK 60-G27. All remaining errors are our own.

¹ Institute for Comprehensive Analysis of the Economy (ICAE), Johannes Kepler University Linz, Austria

² Institute of Socio-Economics, University of Duisburg-Essen, Germany

* Corresponding author. Email: jakob.kapeller@jku.at

1. Introduction

In this paper, we address the claim that a large fraction of authors in leading economics journals is associated with a comparatively small number of well-known economics departments. Hence, these journals are said to reflect some kind of “institutional oligopoly” (Hodgson and Rothman 1999). This evaluation goes back to Hodgson and Rothman (1999, hereafter H&R), who analyzed the institutional and geographical concentration of authors and editors of 30 top economic journals in 1995. About twenty years ago they found a strong dominance of institutions located in the U.S., and, within that subset, a dominance of a small group of elite universities: more than half (54 percent) of the authors of articles published in these “top thirty” journals obtained their PhD degrees at one of twelve prestigious U.S. universities. At the same time, more than one fifth (21 percent) of authors in said journals were also affiliated with one of these universities. According to H&R, these findings have non-trivial implications for the development of the economics discipline since such an oligopolistic structure may prove detrimental for innovativeness in economic research. As H&R conclude:

“The danger with such a high degree of institutional concentration in the editors and authors of journals – as is evidenced by the 1995 data – is that it may be difficult for further change to take place. ‘Lock-in’ may occur, where specific institutions defend specific, and possibly outdated, ideas and approaches. In these circumstances, it would be quite difficult for alternative or innovative approaches to establish themselves...” (Hodgson and Rothman 1999, F182)

Indeed, there is some evidence pointing to the existence of such ‘Lock-ins’ on the institutional level. First, the set of top journals in economics – such as the prominent top5 journals (Card and DellaVigna 2013) – is judged to be fairly stable across time (Diamond 1989; Kalaitzidakis, Mamuneas, and Stengos 2003, 2011; see also below). Second, publishing in high-ranked economic journals has become even more decisive in shaping career paths in the economics discipline over the last decades (Conley et al. 2013; Hamermesh 2018; Heckman and Moktan 2020). Third, current regimes of research evaluation create a competitive environment in which economists strive for getting their research published in the discipline’s most prestigious outlets (Attema, Brouwer, and Van Exel 2014; Kapeller 2010; Serrano 2018). In the past, it has been argued that these path-dependent, hierarchical patterns in economics publishing also negatively impact on the conceptual and theoretical diversity found in economics in general and economic top journals in particular (Kapeller 2010; Stockhammer, Dammerer, and Kapur 2021). And indeed, journal rankings seem to have a wide impact on how economists judge and perceive individual research performance: experimental evidence shows that economists’ judgement of the value of publication lists that contain high-rated journals is negatively affected when such lists contain also lower ranked journals (Powdthavee, Riyanto, and Knetsch 2018).

Against this backdrop we aim to reproduce core aspects of H&R’s original study with current data to provide a large-scale and up-to-date picture on the current status of the

alleged „institutional oligopoly” in economics publishing. For doing so, we compiled a large dataset on authors in top economics journals that also allows us to include an explicit time-dimension – so unlike H&R we are not limited to an analysis of a single point in time (1995 in their original paper), but, rather, are able to track developments across time. In addition, we do not replicate H&R’s analysis of concentration in editorship – a topic that has been recently covered elsewhere (Ductor and Visser 2021).

As such our study not only ties in to related work in bibliometrics on concentration and insularity in economic research discourse (Aistleitner, Kapeller, and Steinerberger 2019; Glötzl and Aigner 2019; Wallace, Larivière, and Gingras 2012), but also relates to the broader literature on hierarchy and stratification in economics (Fourcade, Ollion, and Algan 2015) and its impact on the discipline’s conceptual, institutional and demographic diversity (Corsi, D’Ippoliti, and Zacchia 2019). In this context we suppose that some simultaneity is at work: the quest for publishing in highly regarded top5 journals (Attema, Brouwer, and Van Exel 2014; Serrano 2018; Sutter and Kochner 2001), the tendency to treat citations as the “currency of our industry” (Coffman, Niederle, and Wilson 2017, 3; see also Hamermesh 2018) and the strong focus on rankings to evaluate economists or economics departments (e.g. Handelsblatt, RePEc) can be seen as both, symptom as well as cause of the comparatively stark internal hierarchies in economics (Fourcade, Ollion, and Algan 2015). The latter are causing an increased focus on scientific excellence, which is supposedly found in publications in top journals, while these hierarchies are at the same time nurtured by a quite strict division between top (field) journals and the remainder of the discipline. This aspect becomes especially clear when thinking about the close interconnections between specific economics departments with great visibility and prestige (most prominently: Harvard, Chicago and the MIT; see also Medoff (2006)), the discipline’s major outlets (like QJE, AER or Econometrica) and the important role US-based PhD programs play for the education of economic research professionals. Thus, by analyzing these relations in greater depth we indeed find that important authors, contributions, departments, and outlets are strongly concentrated in terms of their spatial distribution (Gibson 2021), their personal as well as professional networks (Collussi 2019) as well as their biography (e.g. shared PhD-granting institutions).

The remainder of this paper is organized as follows. In the next section we provide a brief overview of the literature that relates to the institutional peculiarities of the economics discipline with a special focus on institutional concentration and oligopolistic structures. Section 3 describes the data and our methodological strategy. Section 4 presents results from a large-scale replication of H&R based on analyzing current affiliations as well PhD-granting institutions of authors in top journals in economics. Section 5 provides a discussion and some concluding remarks.

2. Literature Review

Since the seminal paper of H&R, a rich body of literature has emerged focusing on the institutional peculiarities of the economics discipline. In this section, we provide a brief discussion of the most recent contributions.

The fact that the hierarchical structure of academic economics is characterized by a strong internal stratification has been confirmed empirically in various ways. Glötzl and Aigner (2019) for instance, provide a comprehensive and large-scale analysis of major patterns in economic research over a period of six decades (1956-2016). They find that the discipline is highly concentrated across six dimensions: articles, journals, geographic location, institutions, authors and paradigmatic orientation. For instance, the top5 journals alone (out of 433 journals) account for almost a third (28.5 percent) of all citations and contain 71 of the 100 most-cited articles. In terms of institutional concentration, they show that the top 20 institutions (mostly US elite universities) account for 16.2 percent of all articles and receive 42 percent of all citations. Similarly, the 100 most-cited authors receive 15.5 percent of all citations. In a similar vein, Greenspon and Rodrik (2021a) show that while authors from European institutions have made substantial gains in term of authorships, scholars from developing countries still remain largely excluded in their sample of 100 top-rated journals in the profession.

While this findings are in line with the general observation that scientific (re)production is subject to preferential attachment processes in terms of citations, prestige and attention (Birkmaier and Wohlrabe 2014; Lancho-Barrantes and Cantu-Ortiz 2021; Merton 1968; de Solla Price 1965) there is also some evidence that these processes are more pronounced in economics than in other disciplines. For instance, Glötzl and Aigner (2019) also argue that concentration in economics has increased over time (which indeed would make economists distinct from most other sciences; see Larivière, Gingras, and Archambault (2009)). Aistleitner, Kapeller, and Steinerberger (2019) analyze citation patterns in top5 journals across various disciplines and find that the share of intra-group self-citations among these outlets is almost twice as large in economics than in other social science disciplines. Moreover, they present evidence that economists more strongly tend to conform to institutional incentives that arise in the context of journal rankings (see also Nederhof (2008) for the case of Dutch economists), e.g. by citing mainly sources from high-impact journals, while ignoring contributions published in less well-known outlets. Gibson (2021) provides an interdisciplinary perspective on the institutional concentration of authors of the top5 journals in economics as compared to other disciplines. An analysis of the author-affiliations in these journals in four different years (2000, 2005, 2010 and 2015) reveals that three U.S. ZIP codes are associated with over 40 percent of articles in economics: Harvard and NBER, Chicago and Stanford. While such a high level of concentration is not apparent in other disciplines, spatial concentration in economics has even intensified over time. He argues that such differences in terms of spatial concentration cannot be explained by only referring to seemingly exogenous variables, like market

forces (e.g. salaries) or the reliance on specific research infrastructures (e.g. laboratories). This finding also aligns well with the observations of Fourcade et al. (2015), who show that the impact of institutional prestige on the representation of officials in major academic associations is much greater in economics, as well as Ductor and Visser (2021), who analyze the institutional concentration of the editorial boards of economics journals. Covering more than 100 journals over the period 1990-2011 the authors confirm the persistence of strong editorial oligopolies, in particular at the more prestigious journals. Among other things, they found that in the top5 journals, nearly 30 percent of all editorial board members hold three editorial positions (in contrast, in the overall sample, nearly 80 percent of all members hold only one position). Moreover, most editors received their PhD at US-based institutions, where a small group of elite universities dominate the landscape (nearly 75 percent of all board members obtained their PhD at one of 13 US universities).

On the level of authors, Baghestanian and Popov (2014) analyze 6,000 author-publication observations and find a strong association between the reputation of an economists PhD-granting institution and the probability of publishing in a top economic journal which they call the “Alma mater-effect”.

“The Alma mater effect is large in size: a top-ten graduate has a 30 percent chance of publishing in a top-five journal, but if instead he graduates from a top-thirty, his chances decrease to 17 percent, and lowering his Alma Mater ranking further to 100 lowers his chances to ten percent.” (Baghestanian & Popov 2017, 17)

However, Conley and Önder (2014, 206) find that “graduating from a top department is neither necessary nor sufficient for becoming a successful research economist.” They analyze economics PhDs’ research productivity who graduated between 1986 and 2000 at 154 economics departments in the US and Canada. Their overall conclusion is that, even at top economics departments, only a small share of graduates manages to produce a credible number of top-level publications³ (see also Conley et al. 2013), a finding that would rather point to a strong concentration of top performance in the hands of few talented individuals.⁴ More recent findings from Yuret (2020) and O’Hagan (2021) complement this picture: Yuret (2020) analyzes the institutional background of the authors of the top5 journals in economics between 2008 and 2017 and show that almost every article published in these outlets have at least one author who is either affiliated with or has received his or her PhD at one of ten top-level US institutions. O’Hagan (2021) explores the historical evolution of PhD programs in economics and demonstrates that the dominant position of Harvard and MIT as PhD-

³ Measured in AER-equivalent papers six years after graduation.

⁴ Another study by Önder and Schweitzer (2017) analyzes the publication output of economics PhDs in German-speaking countries. Their main finding is that, compared to their US-based counterparts, PhDs from German-speaking countries perform better in terms of publication output over time. However, this may be partly explained by an increase in quantity rather than quality.

granting institutions is also reflected in the allocation of prestigious awards and that this dominance remains largely unchallenged over the past three decades.

In all, these findings suggest that the diagnosis of an “institutional oligopoly” is still valid today. However, the works discussed in this section either take a holistic perspective on the discipline or focus on a particular aspect of top-level economic research (e.g. the focus on top5 journals or journal editors). With this paper we thus seek to contribute to this strand of literature in three ways. First, we aim to provide a more comprehensive analysis of top-level economic research by covering a broader set of high-impact journals over a period of three decades to replicate and broaden the original approach taken by H&R. Second, we aim to provide a full-scale and more fine-grained analysis of the author affiliations in these journals, which directly relates to articles and institutions. And third, we also conduct an analysis based on a large-scale sample to analyze the institution(s) where these authors received their training to arrive at a more complete description of institutional oligopoly in economics in the spirit of H&R’s original paper. We thereby focus on authors solely as the issue of concentration among journal editors has been exhaustively explored by Ductor and Visser (2021) and is, at the same time, not well covered by our data.

3. Data and Methods

For conducting our empirical investigation, we employ three main sources of bibliographic and biographic data namely (a) Clarivate’s⁵ annually published journal rankings labeled as *Journal Citation Reports (JCR)*, (b) *EconLit* as a core database on academic contributions in economics and (c) manually collected information on the authors in our sample found on CVs and professional websites. The latter step was mainly needed to gather information on the names and geographical locations of the PhD-granting institutions associated with the authors in our dataset.

In processing this data, we first used the Journal Citation Report to identify the most influential journals in economics considering 22 consecutive years (1997-2018, JCR category: economics). To account for the relative long-term position of outlets, we inspected the JCR rankings published in the years under study, counted how often journals were ranked in the top 30 and included all journals above a certain threshold. As we aimed to select a number as close as possible to thirty top journals, we treated the threshold value as a floating variable to eventually arrive at a selection of 30 journals (which led us to a minimal threshold of at least nine appearances in the top 30)⁶. While our selection criterium is quite different to that of H&R it should be noted that the overlap between both journal sets is substantial (21 out of 30 journals) which already confirms a strong persistence of dominant outlets within the discipline. Table 1 provides an overview of the journals in our sample which includes top generalist

⁵ Before 2016, the JCRs were published by Thomson Reuters.

⁶ Since journals #29-31 appeared with the same frequency in the top30 and period under study, we excluded the journal with the lowest average.

economic journals as well as a wide range of economic field journals (e.g. finance, accounting, health and environmental economics)

Table 1. Dataset: selected journals and the overall number of analyzed papers. Footnotes denote the overlap with the top30 in journal sets analyzed by *H&R (1999), ¹Kalaitzidakis et al. (2003), and ²Kalaitzidakis et al. (2011)

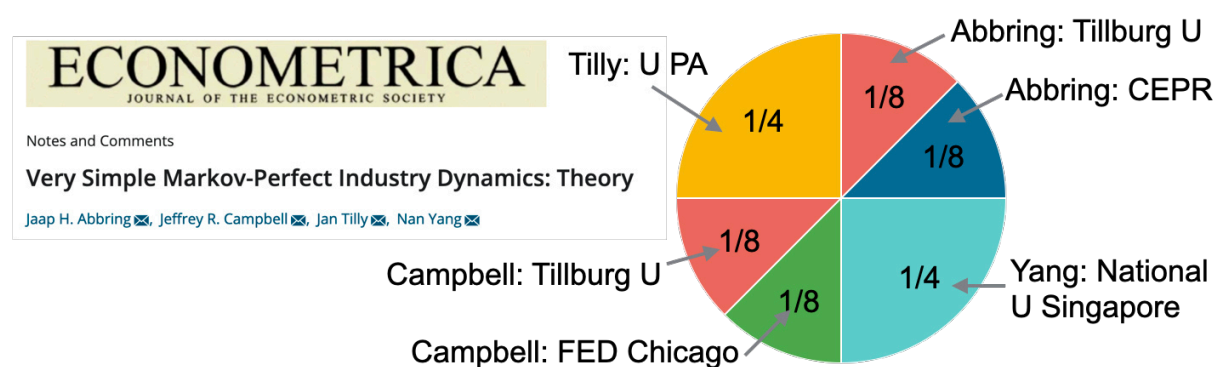
Rank	Journal	# papers
1	Journal of Economic Literature ^{*,1,2}	634
2	Quarterly Journal of Economics ^{*,1,2}	1,254
3	Journal of Economic Perspectives ^{*,1,2}	1,471
4	Journal of Political Economy ^{*,1,2}	1,335
5	Journal of Financial Economics ^{*,1,2}	2,232
6	Econometrica ^{*,1,2}	1,759
7	Economic Geography [*]	543
8	American Economic Review ^{*,1,2}	5,681
9	Review of Economic Studies ^{*,1,2}	1,313
10	Review of Economics and Statistics ^{1,2}	2,250
11	Journal of Accounting & Economics [*]	909
12	Ecological Economics [*]	4,448
13	Journal of Economic Growth ²	311
14	Brookings Papers on Economic Activity ^{*,2}	1,012
15	Journal of Health Economics [*]	1,795
16	Economic Journal ^{*,1,2}	2,539
17	Journal of Economic Geography	653
18	Health Economics	2,143
19	Journal of Environmental Economics and Management ^{*,1}	1,519
20	Journal of International Economics ^{1,2}	1,820
21	Energy Economics	3,115
22	Journal of Labor Economics ^{*,1,2}	889
23	Journal of Law & Economics [*]	811
24	Journal of Finance	2,264
25	Journal of Human Resources ^{*,1,2}	1,043
26	Journal of Monetary Economics ^{*,1,2}	1,961
27	Economic Policy	1,018
28	Journal of Law Economics & Organization [*]	723
29	Review of Environmental Economics and Policy [*]	218
30	Review of Financial Studies	1,806
	Total	49,469

Furthermore, we employ an automated web scraping algorithm and process data on individual articles compiled from the EconLit database covering papers published between 1990 and 2018⁷. We excluded book reviews, editorials, obituaries and all items that either do not contain an author field or are not to be considered as original economic research (e.g. administrative reports). For every paper we collected data on title, author name(s), author affiliation(s), source, publication date, abstract, and JEL-codes. A main advantage of the EconLit database is that it provides detailed

⁷ Data were retrieved on June 2020 and May 2021 (data for Economic Policy was added at a later stage).

information on author affiliations since 1990. As this data refers to affiliations at the time of publication, we always focus on historical affiliations, which implies that some authors will enter our dataset more than once, if they are associated with different institutions over time. This in turn, allows for a more balanced weighting of authors and affiliations associated with a given article, something that is difficult to achieve and, hence, typically not implemented in similar studies⁸. Using this data, we can assign accurate weightings to each article with respect to different authors and affiliations by first dividing a contribution across authors and, in a second step, relating each authors' share of the contribution to her or his affiliations (see Figure 1 for an illustrative example). Thereby, we assign an equal share of the contribution to each author and then distribute each author's contribution equally unto his or her affiliations.

Figure 1. An illustrative example of our weighting procedure for the calculation of author-affiliation weights per paper.



However, this methodological approach comes with a series of practical challenges mostly related to the processing and disambiguation of text-based data. For instance, distinguishing between *and* as part of a single affiliation (e.g. "London School of Economics *and* Political Science") and as a conjunction (e.g. "Harvard *and* NBER") posed a specific challenge. In this context, we set the interpretation of *and* as a conjunction as a default and compiled a go-list with institutions including the phrase *and* by consulting the EDIRC database provided by RePEc⁹ to avoid errors when processing author affiliations. Another related problem are commas that can be either part of an affiliation name or are used to list multiple affiliations of a single author. Since in most cases, authors do not list more than two affiliations we assume that commas are part of an institutions name (e.g. "Environmental Policy Centre, Finnish Environment Institute, Helsinki"). Inspections of repeated random samples drawn from the data show that this strategy results in an error rate of around 2 percent of all compiled affiliations. Furthermore, since our analysis is based on plain textual data, name variation and disambiguation remain fundamental problems. To confront this, we

⁸ For an earlier example see Sutter and Kochner (2001) who manually apply a weighting procedure to a smaller dataset. More recent examples are Fontana, Montobbio, and Racca (2019) and Greenspon and Rodrik (2021) who apply fractional counting to the geographical origin of (multiple) authors per article.

⁹ See also <https://edirc.repec.org/>.

manually checked and harmonized the name variations of the top 1,000 authors (in terms of authorships) and affiliations respectively¹⁰. Finally, we also harmonized the names of all authors for which we manually collected information on their PhD-granting institution, which amounts to more than 3,200 authors (see below for more details).

Applying the weighting procedure sketched In Figure 1 to our dataset of 49,469 papers results in an overall compilation of 113,020 data rows, where each row represents an author-affiliation pair and includes bibliographic information on the paper as well as the weighted share expressing the relative contribution to a paper. Tracking the data in this form is necessary to accurately represent *authorships*, defined as the number of papers a scholar is involved with or an institution is unambiguously related to, and actual *articles*, defined as equivalent to single-authored articles, which are calculated by summing up the weights associated with all authorships of interest. From a more practical perspective going from author-affiliation pairs to authorships is equivalent to correcting for multiple affiliations held by some author at a given point in time, while going from authorships to articles amounts to correcting for co-authorships. Against this background, Table 2 below reproduces some summary statistics describing the basic properties of our dataset on publication in the top 30 journals in economics from 1990-2018.

Table 2. Dataset: basic distribution measures for authors, authorships and affiliations.

Summary statistics on unique authors (n=38,519)					
	Total	Mean	Median	Min	Max
affiliation-author pairs	113,020	2.93	1	1	130
authorships	99,037	2.57	1	1	101
articles	49,469	1.28	0.5	0.17	52.25
affiliations of authors (total)	61,049	1.58	1	1	36
affiliations of authors (unique)	12,844	0.33	--	--	--
authorships in top5	22,073	0.57	0	0	72
articles in top5	11,342	0.29	0	0	33.35

For the analysis of PhD-granting institutions, we draw a random sample (n=4,000) from the unique authors in the raw data to analyze the respective CVs of each author. After cleaning the sample for duplicate authors as described above and excluding those authors where no CV or equivalent information on a professional website could be obtained, we arrived at a sample of 3,253 unique authors, slightly more than 8% of all unique authors. Applying the algorithm sketched in Figure 1, we obtained a dataset containing information on the PhD-granting institutions related to 13,537 author-affiliation pairs (which amounts to a coverage of 12% of all author-affiliation pairs in the full dataset).

As already indicated, we collected data on the geographical location of the institution where the PhD was obtained. We exploited this manually collected data to complement

¹⁰ It should be noted that there are some (rare) cases where two authors have an identical name which is difficult to address in the full dataset. In the case of the PhD sample, we excluded such rare cases.

our full dataset by a spatial dimension via a two-step procedure. First, we match country information available from the random sample of PhD affiliations with the affiliations contained in the overall dataset. Second, we manually gathered country information from all remaining affiliations that appear at least three times in the dataset (which results in a coverage rate of 89 percent of all author-affiliation pairs).

4. Results

In this section we first aim provide a bird's eye view on our results regarding the institutional and geographic concentration of authors in top economics journals. We then turn to presenting more specific results from the analysis of weighted author affiliations and PhD-granting institutions in our full dataset and compare them with the original results of H&R (1999) to explore whether the charge of an institutional oligopoly in economics also holds when considering a larger and more precise dataset. Finally, we analyze the overall distributional properties of the underlying data with a special focus on the upper tail of the distribution of affiliations and PhD-granting institutions to identify the most important institutions.

4.1. Overview

The summary statistics of our dataset shown in Tables 2 already indicate a highly skewed distribution of authorships and institutional affiliations as there is a huge distance between mean and maximal values. Figure 2 visualizes these properties by plotting the overall distribution of these parameters: while the upper left panel in Figure 2 shows the absolute distribution of authorships across authors, in relative terms 44.3 percent of all authorships accrue to only 10 percent of all authors. For the case of author-affiliation pairs (upper right panel), the observed concentration is even more striking: 83.3 percent of all affiliations documented in our dataset relate to only 10 percent of all unique institutions with Harvard University being the most productive institution (2.78 percent). The top five institutions (Harvard, Chicago, MIT, Stanford and Berkeley) alone are responsible for 10,625 affiliations which amount to 9.40 percent of all author-affiliation pairs appearing in our dataset. Furthermore, we have found that most papers in economics have three or less authors (lower left panel in Figure 2); hence, economists continue to work in rather small teams and do not mimic the trend to produce research outcomes in large teams. A similar result is obtained for PhD granting institutions (lower right panel), where the figures also point to a high level of concentration: 10 percent of all PhD-granting institutions have trained roughly 60% of all (unique) authors in our sample, which are responsible for 74.1 percent of all authorships in the PhD sample.

Figure 2. Overall distribution of authorships, authors per article and PhD-granting institutions.

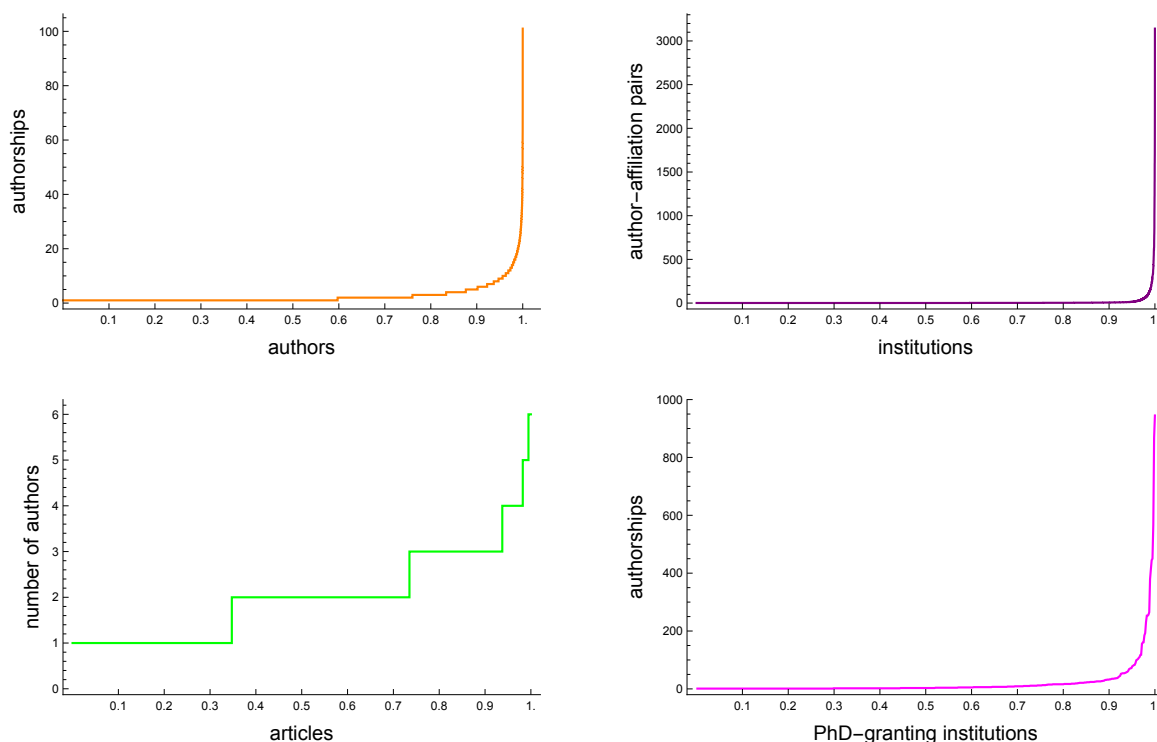


Table 3 further takes a closer look at the institutional background of the top 30 authors in terms of authorships, (main) affiliation and PhD-granting institution. The top 30 authors alone account for 1,731 authorships (or 1.75% of all authorships) with Daron Acemoglu being the most productive author (101 authorships). 20 out of the top 30 authors are affiliated with one of the top five institutions mentioned above and 21 authors obtained their PhD at three top institutions: Harvard, MIT and Princeton. 29 out of the top 30 authors are male which points once more to the stark underrepresentation of women in the discipline.

Table 3. The top 30 authors measured by the number of authorships. *as of August 11th 2021 via online search.

Author name	no. of authorships	affiliation*	PhD-granting inst.
Acemoglu, Daron	101	MIT	LSE
Shleifer, Andrei	97	Harvard U	MIT
Heckman, James J.	86	U Chicago	Princeton U
Stulz, Rene M.	71	Ohio State U	MIT
List, John A.	69	U Chicago	U WY
Tirole, Jean	64	U Toulouse	MIT
Krueger, Alan B.	63	Princeton U	Harvard U
Gruber, Jonathan	62	MIT	Harvard U
Glaeser, Edward L.	61	Harvard U	U Chicago
Hall, Robert E.	59	Stanford U	MIT
Currie, Janet	59	Princeton U	Princeton U
Alesina, Alberto	57	Harvard U	Harvard U
Card, David	57	U CA, Berkeley	Princeton U
Stein, Jeremy C.	52	Harvard U	MIT

Katz, Lawrence F.	51	Harvard U	MIT
Rajan, Raghuram G.	50	U Chicago	MIT
Aghion, Philippe	50	LSE/College de France	Harvard U
Blundell, Richard	50	U College London	LSE
Besley, Timothy	50	LSE	U Oxford
Lerner, Josh	49	Harvard U	Harvard U
Cutler, David M.	49	Harvard U	MIT
Angrist, Joshua D.	48	MIT	Princeton U
Campbell, John Y.	48	Harvard U	Yale U
Poterba, James M.	48	MIT	U Oxford
Blanchard, Olivier	48	MIT	MIT
Neumark, David	48	U CA, Irvine	Harvard U
Haltiwanger, John	47	U MD	Johns Hopkins U
Caballero, Ricardo J.	46	MIT	MIT
Levitt, Steven D.	46	U Chicago	MIT
Wagstaff, Adam	45	World Bank	U York

Taking into account the role of self-reinforcing positive feedback effects in the allocation of scientific recognition and visibility (Birkmaier and Wohlrabe 2014; Merton 1968) and the related general insight, that indicators measuring scientific recognition – like the number of produced papers or received citations – typically show a skewed distribution with a fat right tail that follow some power-law at the top, the general distributional properties visualized in Figure 2 and Table 3 are not too surprising. Against this backdrop, it seems important to emphasize that H&R’s original argument, was not about concentration in academic discourse in general, but rather, that, about the particular way this concentration unfolds in economics. It relates to the claim that institutional hierarchies in economics are especially strong and persistent as well as about the fact that dominant institutions in economics are not diverse within themselves, but, rather, very similar to each other (as most top universities are US-based elite scientific institutions and a very large majority is based in anglo-saxon countries, see Corsi et al. 2019). In sum, this causes an institutional closure that makes it more difficult to gain attention for ideas that emerge outside of this small elite circle of major authors, institutions and journals, which form a close-knit network.

The results so far are derived from the aggregation of the available data. Including a temporal dimension and disaggregating the data by the geographical location of affiliations (Figure 3) and PhD-granting institutions (Figure 4) reveals a clear trend. While the share of affiliations located in the US has gradually decreased from roughly 70 percent in 1990 to 40 percent in 2018, non-anglo-saxon countries have roughly tripled their shares to almost 30 percent of all affiliations in the same period. This trend is largely in line with the analysis of Greenspon and Rodrik (2021) who document a general decline of US-based institutions while European-based institutions are increasing their shares among a sample of top 100 economic journals. Not surprisingly and also in line with their results, we observe a stark underrepresentation of author affiliations based in developing countries (with the notable exception of China). However, these results should be taken with a grain of salt as the geographical position of authors’ seems to be highly contingent on the specific journal considered. In this

context not only a ‘home-bias’ is observed, but it is also found that the most visible journals show a higher share of US-authors, while field journals (e.g. Energy Economics) and more unconventional journals (e.g. Ecological Economics) strongly contribute to a greater spatial diversity of authors in the aggregate data (see also Figures 8 and 9 below as well as Figure A2 in the Appendix).

Figure 3. Geographical distribution of affiliations over time.

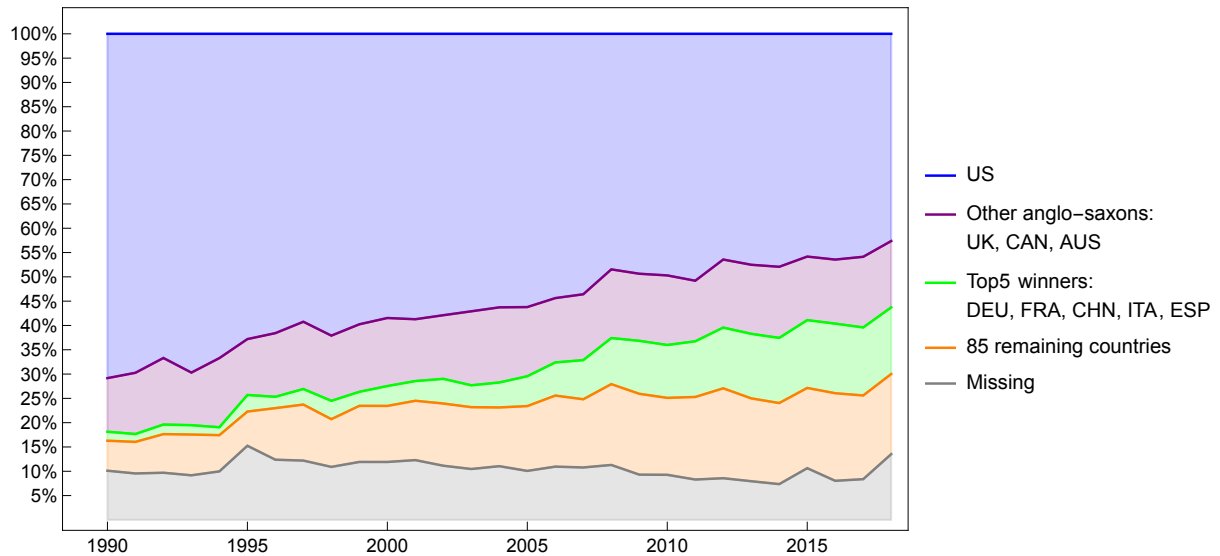
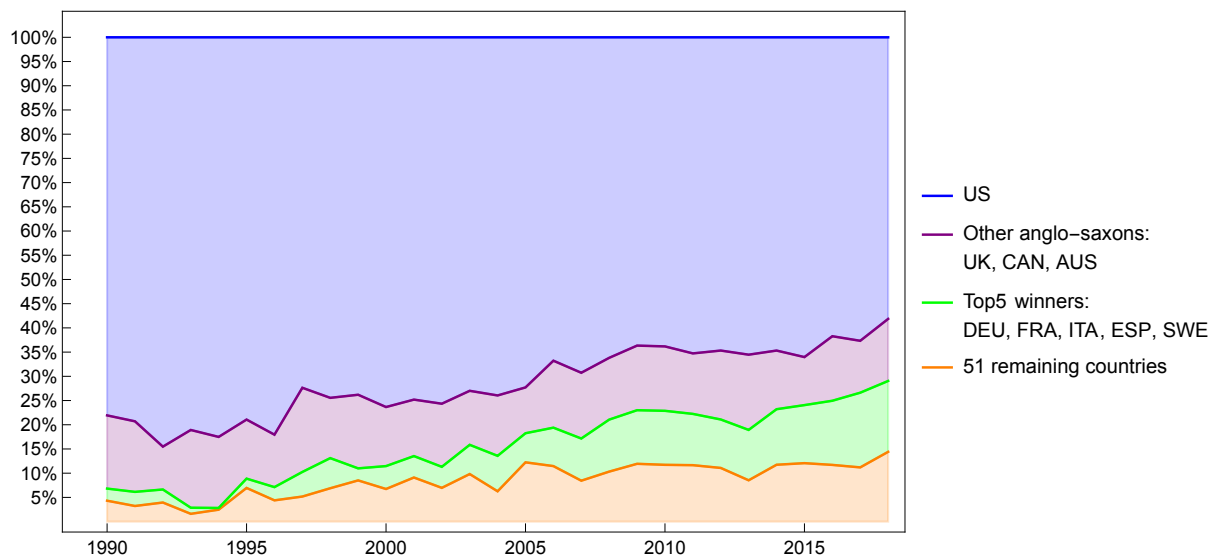


Figure 4. Geographical distribution of author's PhD-granting institutions over time.



However, this trend is less pronounced when looking at the development of author's PhD-granting institutions (Figure 4). Publication data based on our random sample show that in 2018 roughly three out of four authors have received their PhD at an anglo-saxon institution with the US still accounting for 60% of all graduates.

4.2. Comparison with H&R (1999)

In a next step, we investigate whether H&R's results are robust with regard to a variation in the time-scale and the associated changes in ‘second-tier’ top journals that

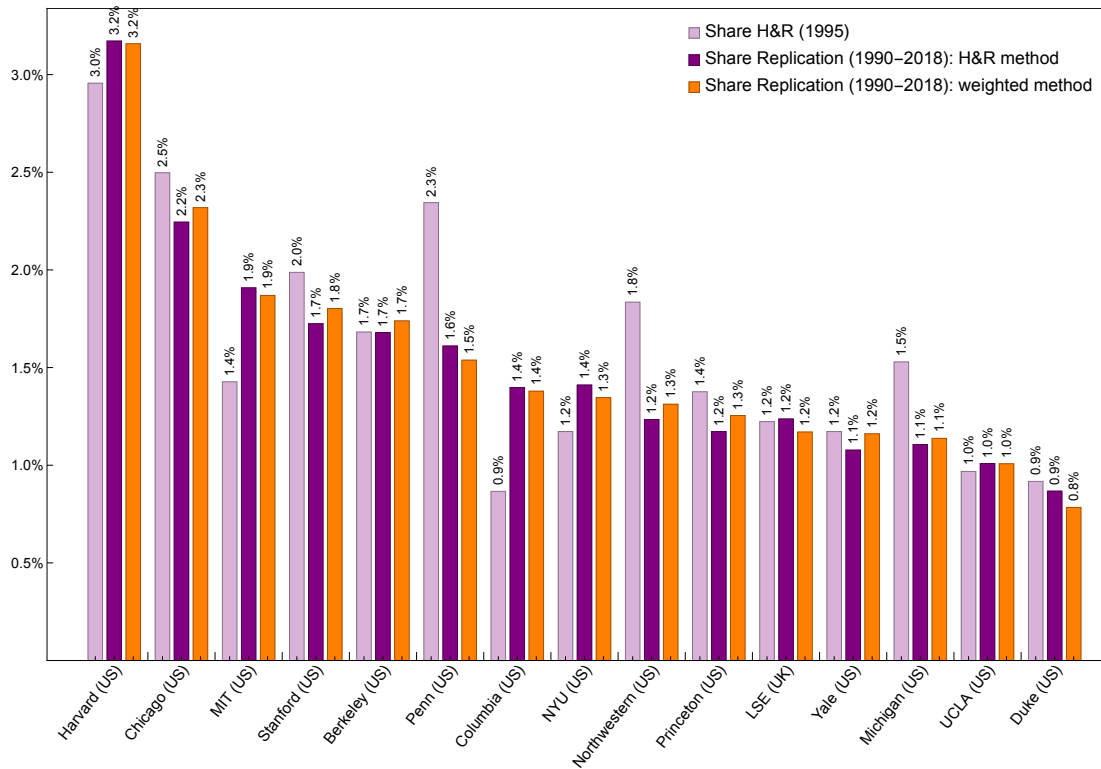
can be observed over time. As our dataset is constructed to reflect these two aspects by including a longer time-span as well as by selecting a more timeless sample of thirty top-journals, we can directly proceed with a comparison of the estimated shares for the most important affiliations and PhD-granting institutions of the authors under study as shown in Figures 5 and 6. At this point it should be noted that our methodological approach substantially deviates from the approach pursued by H&R. As described above, we calculate weighted shares of authorships and affiliations responsible for producing a paper while H&R count unweighted authorships based on what they assume to represent the primary academic affiliation of an author. Thus, to make our results better comparable, we also replicate the approach used by H&R and calculate unweighted authorships by assuming that the top ranked institution in our dataset also represents the primary affiliations¹¹.

Overall, we find a strong agreement between the data presented by H&R for 1995 and our own data, which covers a longer time-span and a more nuanced selection of ‘top journals’, which is less dependent on the relative prominence of journals as observed in the 1990s. The degree of correlation between the measured shares is especially high for the most visible institutions, which suggests that hierarchies in academic are less stable across “second-tier” top institutions, whose share is affected more strongly by the overall expansion of the discipline over time. In line with the analysis of H&R, we show the thirty most important institutions identified from the top30 journals used by H&R. However, this fine-grained comparison only works in one direction as we can only rely on the published data for H&R, which is restricted to their set of top30 journals. However, when asking for the exact composition of the top30 institutions in the replication data, we find a significant overlap with the top30 institutions identified by H&R— more precisely, 21 of the institutions identified as top30 by H&R also are within the top30 in the replication data¹² and all of H&R’s top30 are positioned within the top100 in the extended data. This observation points to a strong persistence of institutional hierarchy in economics over the last decades. This persistence also maps onto a geographical level as the large majority of the institutions covered is based in the US and none is located outside the anglo-saxon countries.

¹¹ This is less problematic as it might seem at first glance as being affiliated with two top-level universities at the same time (e.g. Harvard and MIT) is rather the exception than the rule. Moreover, most secondary affiliations are non-university institutions (e.g. NBER).

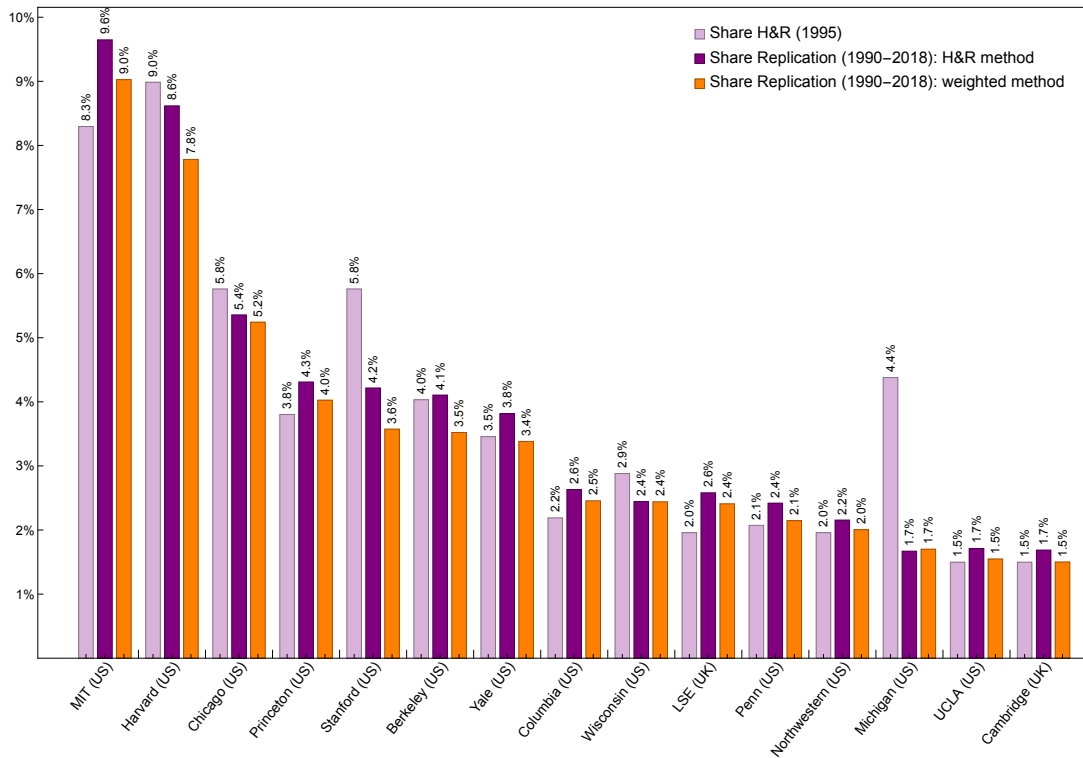
¹² See Figure A1 in the Appendix for the top institutions that are ranked #16-30.

Figure 5. Most important affiliations in top30 journals: H&R vs. replication. The affiliations are ordered according to their relative share in the replication study.



Similar observations can be made regarding the stable and prominent role of major PhD-granting institutions – if anything, the alignment between the estimates of H&R and our replication estimates is even closer in this case. To obtain this comparison we measure the total relative weight of authors, that have graduated at a certain institution, which, as in H&R, leads to an even stronger result on institutional concentration in academic economics. This concentration also seems more stable over time as the strikingly similar estimates across both analyses suggest. Now as then, this finding underscores the pivotal impact educational facilities have on the further development of scientific fields – an observation that is especially peculiar as, again, most dominant institutions are located in the US, with the only three geographical outliers being in the UK. As in the case of affiliations, the results obtained from our replication dataset indicate the robustness and validity of H&R’s original results. Thereby, Figure 6 closely follows the presentation of H&R and, hence, plots the relative share of those top15 PhD-granting institutions that have been identified in their original analysis. However, in this case the abovementioned bias emerging from the constraint of unidirectionality is truly minimal as 13 of H&R’s top15 PhD-granting institutions are also positioned in the top15 of the replication dataset (and all of H&R’s top20 are positioned within the top30 of the replication dataset).

Figure 6. Most important PhD-granting institutions in top30 journals: H&R vs. replication. The institutions are ordered according to their relative share in the replication study.

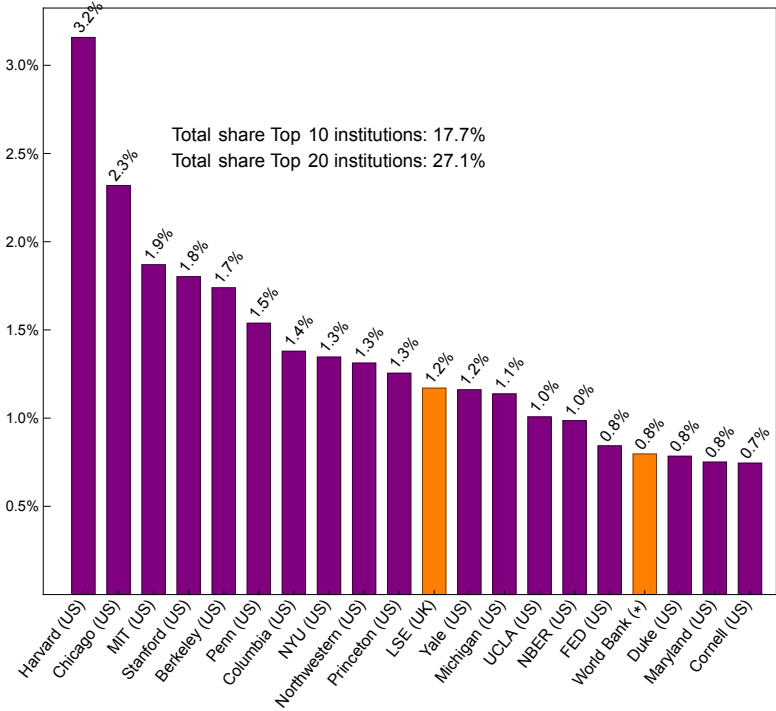


4.3. Evaluating concentration in author affiliations on the level of journals

A first picture on the overall concentration of author affiliations has confirmed the general message of H&R’s original paper. However, given our more fine-grained and larger dataset, in what follows, we will exploit the opportunity to excavate additional interesting properties of economic research discourse as conducted in top journals.

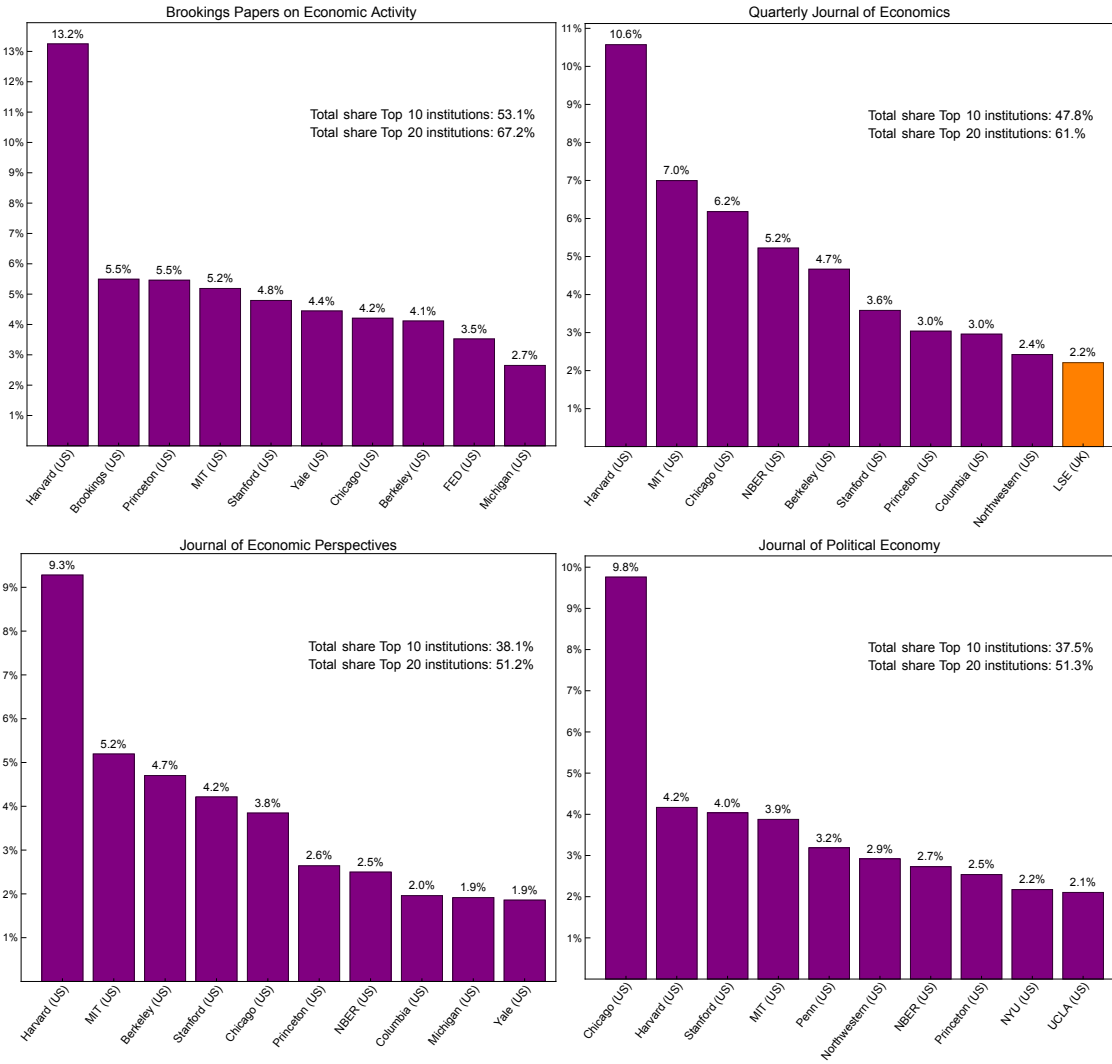
On the aggregated level, author affiliations in our dataset of top economic journals are highly concentrated among a small set of prestigious US-based elite universities (see Figure 7): More than a quarter of all weighted affiliations in our dataset stem from only 20 institutions; that is, on average, every fourth article in our top30 journals is produced by this set of 20 institutions. To highlight the prominent position of US-based institutions we plot bars associated with affiliations outside the US in a different color.

Figure 7. Top10 institutions with the greatest share of authorships in the top30 journals



To get a better appreciation for the journal-specific heterogeneity of discursive patterns and spatial as well as institutional concentration in economics, Figures 8 and 9 show more fine-grained results for the four journals with the greatest concentration (measured as the share of authorships attributed to the top 10 institutions with each journal) and the four journals with the lowest discursive concentration. Casual inspections of these figures show, that the four journals with the highest institutional concentration contain three highly appraised, generalized journals (QJE, JEP & JPE), while the four journals showing the lowest degree of concentration can all be considered special field journals with high impact. Note also, that institutions based outside the US in particular and the Anglo-Saxon countries in general manage to achieve greater relative prominence on those less concentrated journals. Intuitively, the finding that higher quality generalist journals show greater homogeneity in terms of the institutional ties of their authors as compared to more specialized journals, is surprising as one would assume that the ‘topical niches’ that underlie these field journals would also show a greater spatial fragmentation. Contrary to this intuition, it seems that in economic high-quality generalist knowledge is concentrated in fewer places than is specialized knowledge.

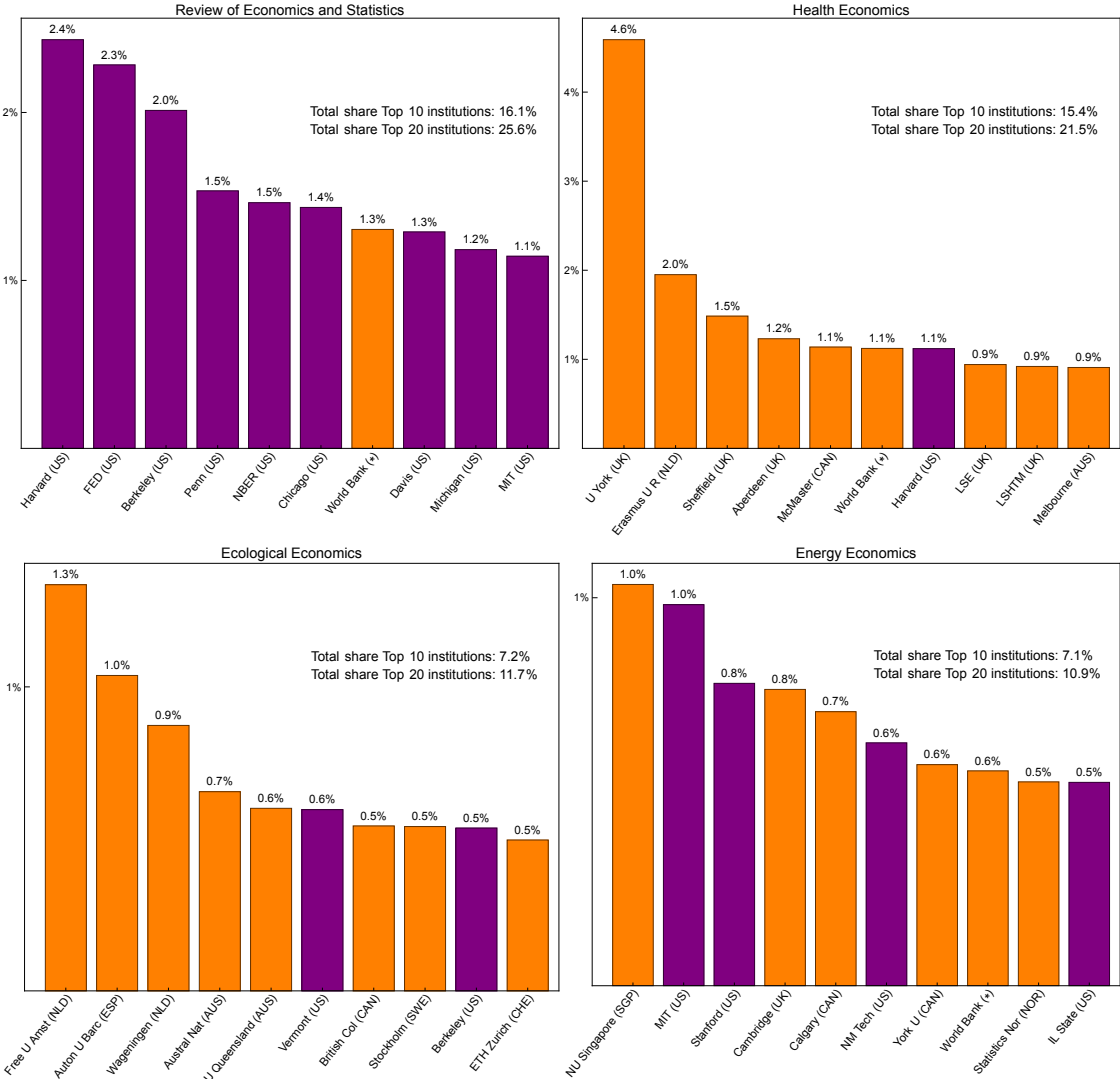
Figure 8. The four most concentrated journals in the top30



When inspecting Figure 9, it is also noteworthy that a journal with one of the lowest concentration in our sample – Ecological Economics – is also an outlier in terms of content as Ecological Economics is known to be more open to interdisciplinary and heterodox submissions as compared to the remainder of the top30 journals under study. In this vein, also Figure 8 can be fruitfully interpreted in greater detail. For instance, we observe in line with other studies (Colussi 2017; Medoff 2006) that institutional ties also do play a role for the allocation of journal-space within top-journals as the JPE – which is edited at the University of Chicago and published by the in-house press – shows an over proportional share of papers coming from the University of Chicago, while the QJE is traditionally associated with Harvard and MIT, which also reflects on the share of contributors in the QJE, that are associated with said universities. The importance of such institutional ties is also difficult to align with the typical reasoning in economics that the dominant position of some institutions simply reflects the high quality of their associated research outputs, which would render such a ‘home-bias’ less plausible. Finally, Figure 8 also contains the Journal of Economic Perspectives (JEP) that can be considered as an outlier in terms of editorial policies as contributions to the JEP are typically invited by the editors. However, at least for the

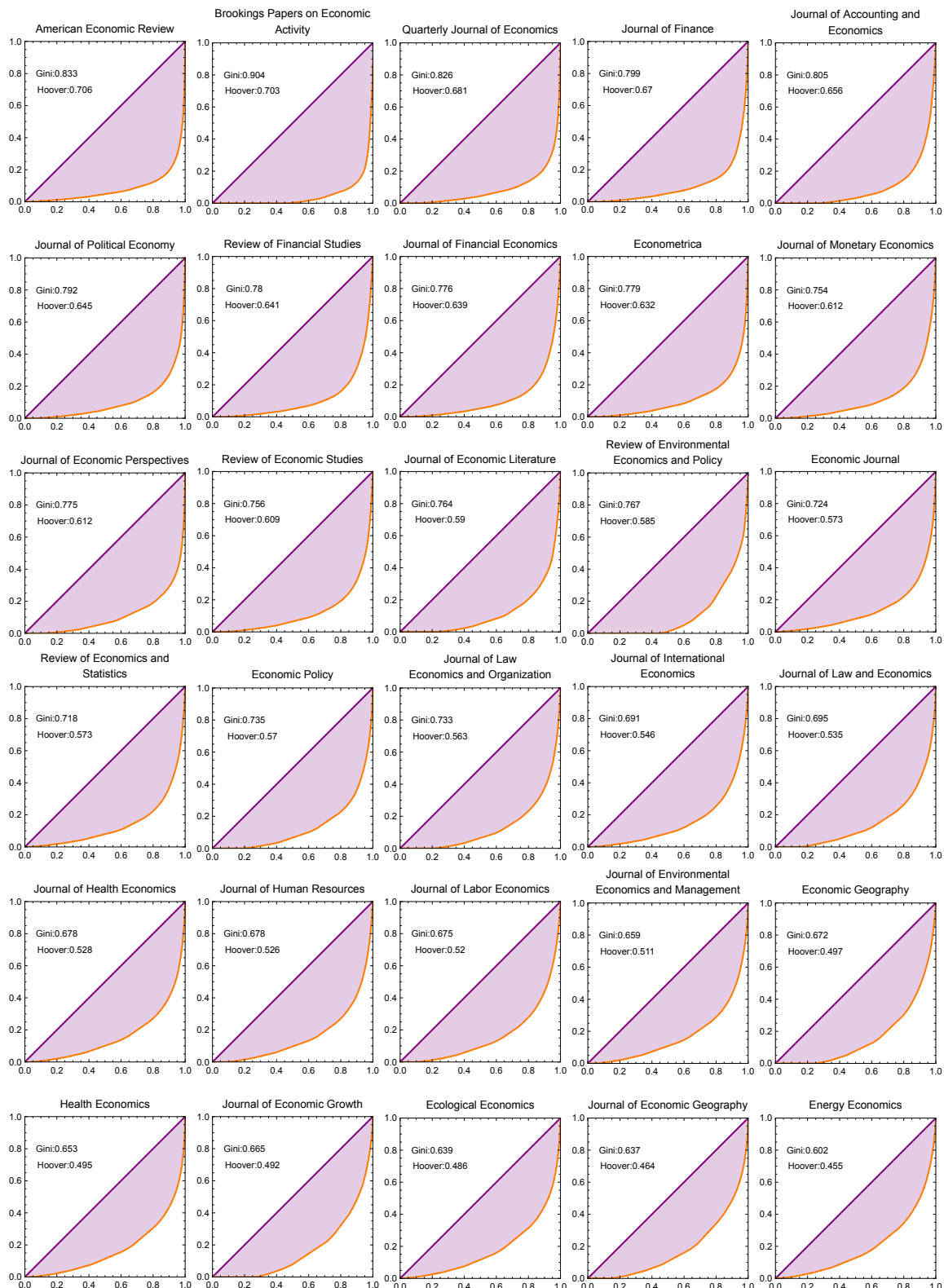
JEP this alternative editorial routine does not seem to contribute to greater institutional inclusiveness.

Figure 9. The four least concentrated journals in the top30



For now, this casual inspection leaves two main question open: For one, while the share of the top institutions within the most concentrated journals as shown in Figure 8 might already seem dramatic, it seems difficult to put these numbers into context and to provide an accurate interpretation of *how unequal* exactly the institutional involvement in economics top journals is. For another, one main pattern of interest observed in Figures 8 and 9 – namely that high-quality, generalist journals seem to be more exclusive – still remains elusive as it is not very rigorously documented.

Figure 10. Lorenz-curves, Gini-coefficients and Hoover-Indices for all journals under study



We address these two issues jointly by means of Figure 10, which shows Lorenz-curves, Gini-coefficients and Hoover-Indices for inequality for all journals under study, where the ordering of journals is governed by the Hoover-Index, which is probably the more objective indicator as compared to the more widely used Gini-coefficient. While both ways of ranking journals with regard to concentration introduced in this paper –

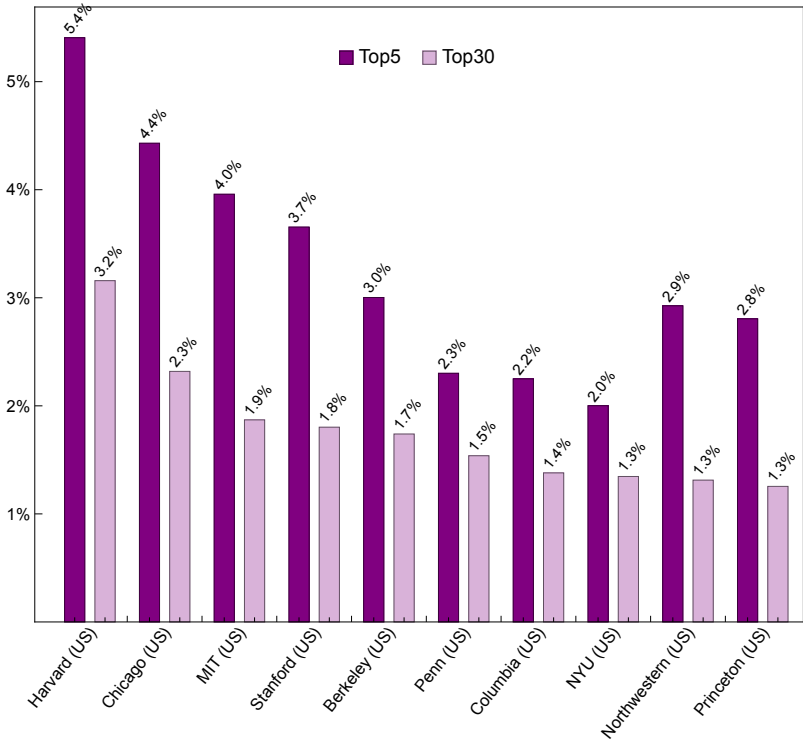
the share of the ten most important institutions as well as the Hoover-Index – may seem rather similar at first sight, a key difference between both approaches is that the latter is more sensible with regard to how the underlying population is defined. In other words, the question is about how to treat zeros in our data that appear when some institution is not at all represented in a given journal. The first indicator defines the top institutions in absolute terms ('top10'); hence it is not so much affected by the question how many institutions are represented in a given journal. However, the Hoover Index cares only for relative values, which may lead to strong deviations from the first view. Consider the hypothetical case, in which only ten institutions publish in a journal and they do so in equal shares. As a result our first indicator would reach its upper limit (100% of all articles are related to the top 10 institutions), while our second indicator would approach its lower bound (in relative terms, there is perfect equality between all institutions able to publish in this journal). To compensate for this fact and to make the resulting rankings better comparable across journals we defined a base population by taking the top 2% of all institutions in our dataset. We then complemented the list of institutions publishing in some journal by comparing it with our base-population to account for the degree of 'total exclusion' of institutions from some journals.

Hence, journals shown at the top-left of Figure 10 are more concentrated than those shown at the bottom right¹³. Figure 10 thereby further confirms our initial impression – that highly visible, generalist journals tend to be more concentrated as all top five journals as well as the *Journal of Economic Perspectives* reside in the upper half of the resulting ranking. However, we also observe that the field of finance differs from the other research fields as finance-journals also exhibit a higher degree of concentration according to this measure. Inversely, the bottom half of the resulting ranking is mainly populated by highly regarded field journals. Assuming that highly visible institutions, authors and journals form a close-knit network (Colussi 2017; Heckman and Moktan 2020), one would expect that the higher degrees of concentration in generalist top-journals would also translate in a relative greater presence of highly visible institutions. In other words, we would expect 'top-journals', 'top-authors' and 'top-institutions' to cluster together. Following this line of thought, we effectively assume the presence of a positive feedback loop, in which dominant institutions profit from an over-proportional representation in the most highly regarded journals, which in turn makes it more attractive for journals to accept the manuscripts of authors from these institutions. We can empirically inspect the plausibility of this

¹³ The value of the Gini-Index is above 0.8 for the most unequal journals, while the lowest values are slightly above 0.6. While such comparisons should be taken with a grain of salt, the upper range of these Ginis is equivalent to Gini-coefficients found in analyses of wealth distributions, which can be considered as one of the most strongly skewed distribution to be found in economic data. Also, the lower range of the observed values is somewhere in-between of the values typically obtained from wealth-data and data on income inequality in developing countries. As the latter are more unequal than the typical developed country, all our estimates can be considered to signify far greater inequality than that expected of the income distribution of a developed country (which is already coined by a strikingly high degree of absolute and relative differences in income).

assertion by computing the relative share of articles attributed to the most visible institutions in our data for the top5 journals and the top30 journals separately. The result of this undertaking is shown in Figure 11 below and confirms our intuition that increased concentration in the very top journals coincided with an even greater representation of the most important institutions in our date-set: The share of authors in top five journals that are affiliated with the top 10 institutions in our dataset is almost twice as high in seven of the 10 and more than a third higher in the remaining three institutions.

Figure 11. Presence of the most important institutions in top5 and top30 journals



So far, we have always used pooled data in our analysis, which might hide substantial temporal heterogeneity in case internal dynamics in the profession lead to a change in prevailing institutional hierarchies. To account for this possibility, we now exploit the temporal properties of our dataset, to analyze whether and to what extent the phenomena described so far are indeed stable over time. Doing so in a concise and yet accessible way, requires some additional aggregation on the side of journals. In our case we choose to plot the cumulative share based on three sets of top institutions (top3/top5/top10) as given by a simple ranking of institutional visibility (also utilized in Figures 7 and 11). Basically, we ask whether the share of this homogenous group of top institutions represents a stable hierarchical position has – that is, a stable share in articles in top-journals – over time.

Figure 12. Presence of the most important institutions in top5 and top30 journals over time

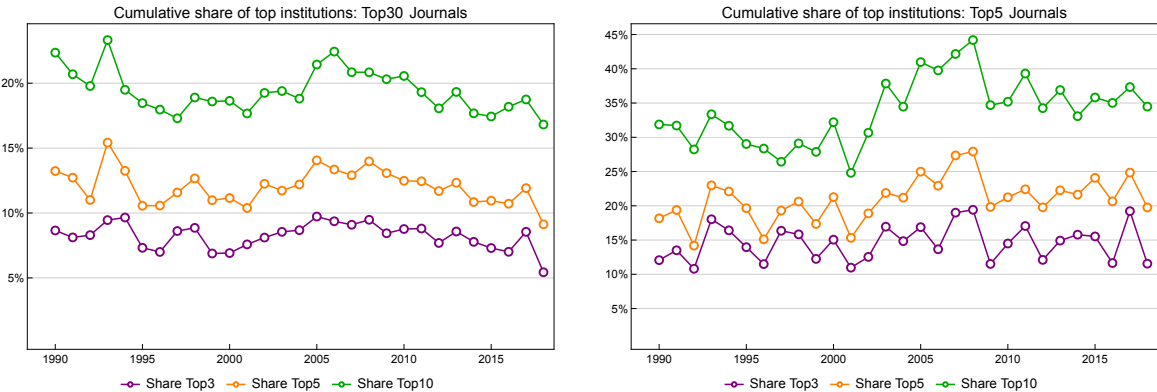


Figure 12 provides a first answer to the question posed above: while in the top30 journals the share of top institutions appears to be slightly decreasing in the past 15 years or so, the share of contributions emerging from the most dominant institutions in the top5 journals remains quite stable for the past 15 years and has even seen a slight increase before that.

4.4. Evaluating the impact of PhD-granting institutions on the level of journals

Already the preliminary analysis of the relative impact of major PhD granting institutions in economics undertaken in section 4.1 indicated that there is an even higher degree of institutional concentration when looking at PhD-granting institutions (understood as the share of articles in top journals, that are produced by the graduates of an institution) as compared to the concentration of author affiliations (understood as the share publications attributable to the employees of an institution). Thereby, it is quite natural to assume that the graduates of departments with the highest merits are represented overproportionally with a given academic field. Notwithstanding, this word of caution, the measured shares of articles, that are attributable to graduates from only a handful of universities still seem nominally huge. This double grip of elite economic departments on both – major journals as well as major educational pathways into the profession – resonates well with H&R’s original claim as it makes the assertion of an institutional oligopoly quantitatively as well as qualitatively tractable. In the context of such an argument it is important to note that the actual overlap between both rankings – impact by means of employees as well as through graduates – is strikingly high. Comparing, for instance, the top20 institutions in both categories (see Figures 7 above and Figure 13 below), we find an overlap of 14 institutions.

Figure 13. Most prominent/important PhD-granting institutions among the top30 journals

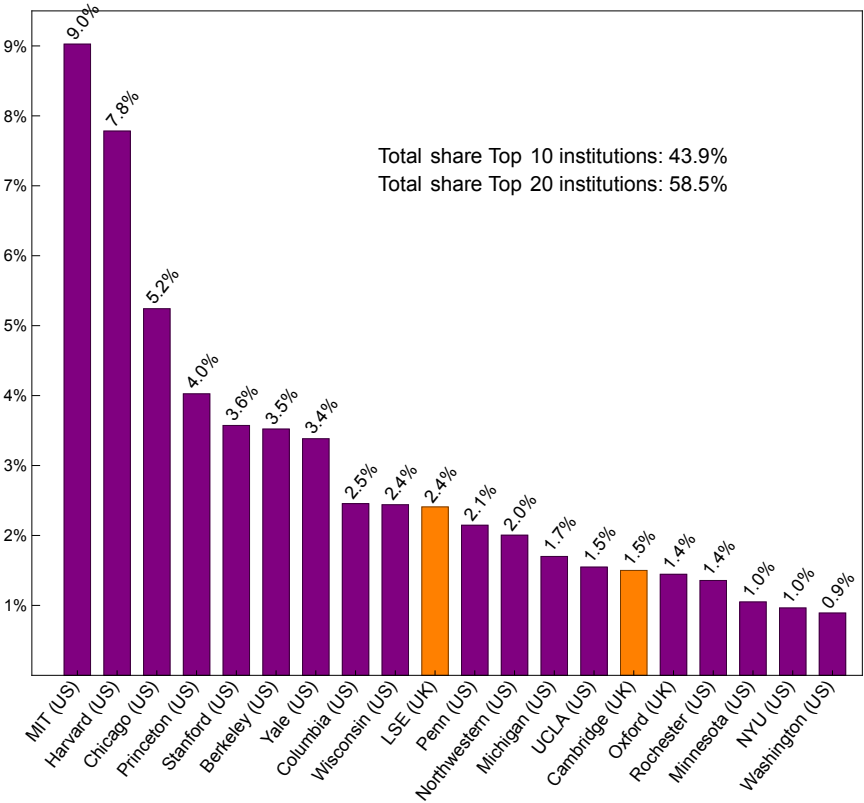


Figure 14 thereby reproduces charts for all single journals under study. The main reason for doing so is that these charts are useful for tracking the institutional peculiarities that coin the reciprocal publication network consisting of highly visible authors, highly regarded journals and prestigious universities. For instance, Harvard graduates are over-represented not only in the *Quarterly Journal of Economics* (QJE), which has institutional ties to Harvard, but also in journals related to Economic Growth, International Economics and Environmental Economics as well as in generalist journals, which feature mainly invited papers (JEL and JEP). MIT, on the other hand, is not only the overall strongest force in terms of PhD-graduates publishing in the top30 journals – as Figure 13 indicates, publication of MIT-graduates make up 9 percent of our sample – but especially dominant in highly regarded generalist journals like the *American Economic Review* (AER), *Econometrica* or the *Review of Economic Studies* as well as in Finance and International Economics. The University of Chicago, finally, is exceptionally visible in finance and macro-related issues as well as in Law & Economics. And, perhaps unsurprisingly, graduates of the University of Chicago also dominate the Chicago-based *Journal of Political Economy* (JPE).

Figure 14a. Most prominent/important PhD-granting institutions among the top30 journals: journal-specific results

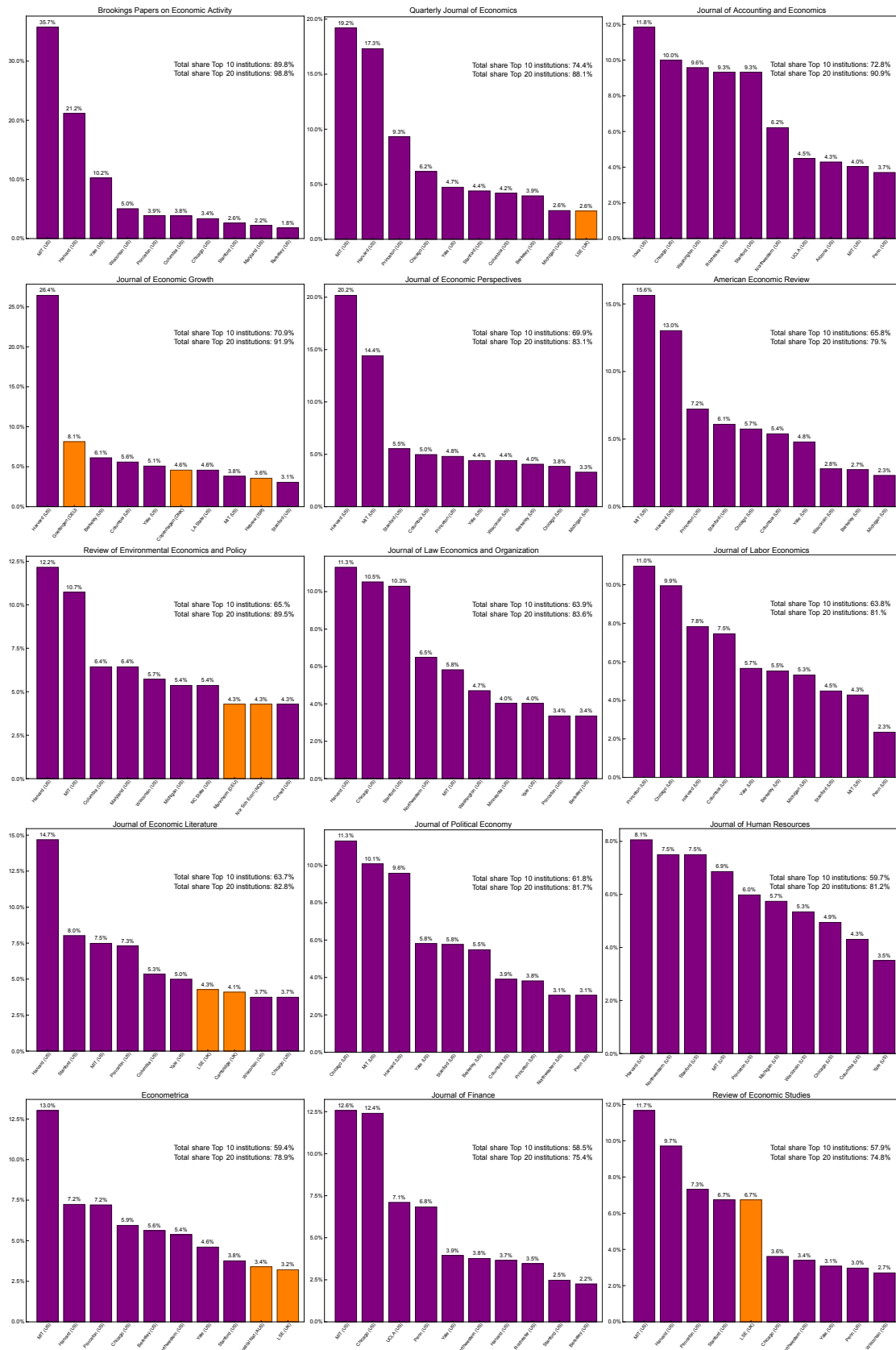


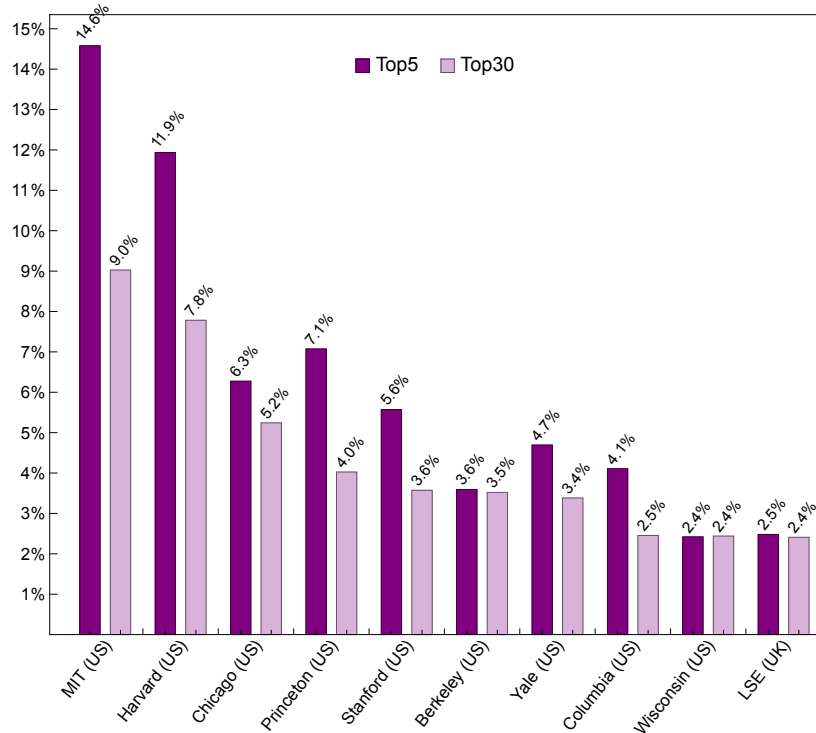
Figure 14b. Most prominent/important PhD-granting institutions among the top30 journals: journal-specific results



What is somehow evident here is that the findings on dominant PhD-institution look qualitatively similar to the findings on the distribution of affiliations (although the magnitude of concentration is larger in general); this observation also holds for more

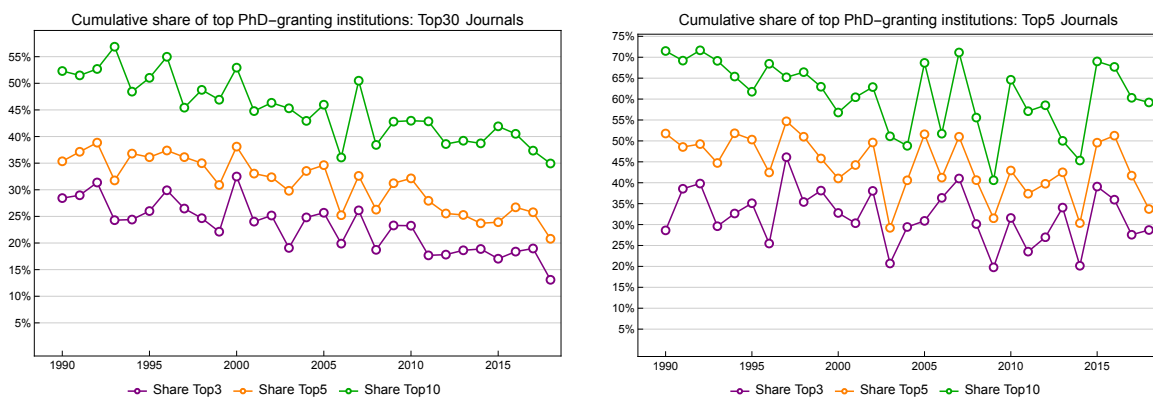
specific patterns observed in section 4.3 such as the relatively stronger concentration and dominant position of prominent institutions in more highly regard journals (see Figure 15).

Figure 15. Impact of the most important PhD-granting institutions in top5 and top30 journals



The same assertion holds, by and large, for the time-series view (see Figure 16). The one main difference is that we do indeed observe a slight downward trend of the impact of graduates from major PhD-granting institutions over time (although this development is starting from a very high level). However, if we focus solely on the top5 journals instead this trend becomes considerably weaker – especially for the very top institutions.

Figure 16. Impact of the most important PhD-granting institutions in top5 and top30 journals over time



5. Discussion and Conclusion

The main aim of this paper is to provide a descriptive exploration to critically reflect and substantiate past observations on institutional concentration in economics. The descriptive results as such are also useful to understand how established hierarchies in economics map onto actual publication patterns and to provide some basic intuition for studying the sociological mechanisms and the formal and informal networks, that foster and preserve the high degree of institutional concentration in economics.

Most economists would probably be unimpressed when confronted with our results and argue that economics is a discipline is simply quite successful in locating the best minds only in a few places. Hence, concentration is driven solely or mostly by quality and has little to do with institutional prestige, although the latter may indeed serve as a suitable 'signal' in academic labor market contexts. Both, concentration and prejudice are then reframed as fostering an effective research process that mimics an efficient allocation of resources. Success is then conceived in terms of citation exports and the most visible institutions are simply to be conceived as 'successful', instead of powerful. While this is a nice example for how prevailing theories and world-views might impact on the interpretation of presumably neutral data, a constructive response would probably point to the differences in reported shares that seem to have a close relationship to underlying institutional patterns. If publication prospects only depend on quality – and Harvard and Chicago graduates are of about the same quality – then they should have equal shares of papers in both, QJE and JPE, shouldn't they? In other words, our data casts much doubt on the simplistic Null-hypothesis that it is only quality that matters. At the same time – as intrinsic quality is unobservable – we cannot rule out the general possibility that the stark internal hierarchies coining economics contribute to *some form of efficiency*.

However, our overall finding of the long-term persistence of strong institutional oligopolies in economics publishing and its implications for the development of the discipline aligns well with recent evidence from a large-scale survey among economists (Falk and Andre 2021).

“Most researchers are dissatisfied with the current state of economic research, including many of the field’s most successful scholars. Respondents think that economic research should become more policy-relevant, multidisciplinary, risky and disruptive, and pursue more diverse topics. We also find that dissent with economics’ research practices is associated with lower job satisfaction and is higher among female economists, which likely has consequences for the diversity of scholars in economics.” (Falk and Andre 2021, 29)

As our study is explorative in nature it points to many venues for further research: For one, interdisciplinary comparison would be useful to better put our results into context – especially, as past research has repeatedly shown that economic research discourse is indeed different on many levels from the discourse patterns observed in other social

sciences. For another, the time-series properties of our dataset could be exploited more eagerly, to better understand specific dynamics related to single journals or universities over time. Moreover, and although our data is rudimentary in many respects, we have gone a long way to assure a more or less consistent database for tracing the networks between authors, contributions, outlets and institutions (on two levels, employment as well as education) that could serve as a basis for a network analysis that might better explain the dynamic of persistence associated with institutional hierarchies in economics.

6. References

- Aistleitner, Matthias, Jakob Kapeller, and Stefan Steinerberger. 2019. "Citation Patterns in Economics and Beyond." *Science in Context* 32(4):361–80. doi: 10.1017/S0269889720000022.
- Attema, Arthur E., Werner B. F. Brouwer, and Job Van Exel. 2014. "YOUR RIGHT ARM FOR A PUBLICATION IN AER?" *Economic Inquiry* 52(1):495–502. doi: 10.1111/ecin.12013.
- Baghestanian, Sascha, and Sergey V. Popov. 2014. "Alma Mat(t)Er(s): Determinants of Early Career Success in Economics." *SSRN Electronic Journal*. doi: 10.2139/ssrn.2506817.
- Birkmaier, Daniel, and Klaus Wohlrabe. 2014. "The Matthew Effect in Economics Reconsidered." *Journal of Informetrics* 8(4):880–89. doi: 10.1016/j.joi.2014.08.005.
- Card, David, and Stefano DellaVigna. 2013. "Nine Facts about Top Journals in Economics." *Journal of Economic Literature* 51(1):144–61. doi: 10.1257/jel.51.1.144.
- Colussi, Tommaso. 2017. "Social Ties in Academia: A Friend Is a Treasure." *The Review of Economics and Statistics*. doi: 10.1162/REST_a_00666.
- Conley, John P., Mario J. Crucini, Robert A. Driskill, and Ali Sina Önder. 2013. "The Effects of Publication Lags on Life-Cycle Research Productivity in Economics." *Economic Inquiry* 51(2):1251–76. doi: <https://doi.org/10.1111/j.1465-7295.2012.00480.x>.
- Conley, John P., and Ali Sina Önder. 2014. "The Research Productivity of New PhDs in Economics: The Surprisingly High Non-Success of the Successful." *Journal of Economic Perspectives* 28(3):205–16. doi: 10.1257/jep.28.3.205.
- Corsi, Marcella, Carlo D'Ippoliti, and Giulia Zacchia. 2019. "Diversity of Backgrounds and Ideas: The Case of Research Evaluation in Economics." *Research Policy* 48(9):103820. doi: 10.1016/j.respol.2019.103820.
- Diamond, A. M. 1989. "The Core Journals of Economics." *Curren Contents* 1:4–11.
- Ductor, Lorenzo, and Bauke Visser. 2021. *Concentration of Power at the Editorial Boards of Economics Journals. The Paper*. 21/01. Department of Economic Theory and Economic History of the University of Granada.
- Falk, Armin, and Peter Andre. 2021. "What's Worth Knowing? Economists' Opinions About Economics." *SSRN Electronic Journal*. doi: 10.2139/ssrn.3885426.
- Fontana, Magda, Fabio Montobbio, and Paolo Racca. 2019. "Topics and Geographical Diffusion of Knowledge in Top Economic Journals." *Economic Inquiry* 57(4):1771–97. doi: 10.1111/ecin.12815.
- Fourcade, Marion, Etienne Ollion, and Yann Algan. 2015. "The Superiority of Economists." *Journal of Economic Perspectives* 29(1):89–114. doi: 10.1257/jep.29.1.89.
- Glötzl, Florentin, and Ernest Aigner. 2019. "Six Dimensions of Concentration in Economics: Evidence from a Large-Scale Data Set." *Science in Context* 32(4):381–410. doi: 10.1017/S0269889720000034.
- Greenspon, Jacob, and Dani Rodrik. 2021. *A Note on the Global Distribution of Authorship in*

- Economics Journals*. w29435. Cambridge, MA: National Bureau of Economic Research. doi: 10.3386/w29435.
- Hamermesh, Daniel S. 2018. "Citations In Economics: Measurement, Uses, and Impacts." *Journal of Economic Literature* 56(1):115–56. doi: 10.1257/jel.20161326.
- Heckman, James J., and Sidharth Moktan. 2020. "Publishing and Promotion in Economics: The Tyranny of the Top Five." *Journal of Economic Literature* 58(2):419–70. doi: 10.1257/jel.20191574.
- Kalaitzidakis, Pantelis, Theofanis P. Mamuneas, and Thanasis Stengos. 2003. "Rankings of Academic Journals and Institutions in Economics." *Journal of the European Economic Association* 1(6):1346–66. doi: 10.1162/154247603322752566.
- Kalaitzidakis, Pantelis, Theofanis P. Mamuneas, and Thanasis Stengos. 2011. "An Updated Ranking of Academic Journals in Economics." *Canadian Journal of Economics/Revue Canadienne d'économie* 44(4):1525–38. doi: <https://doi.org/10.1111/j.1540-5982.2011.01683.x>.
- Kapeller, Jakob. 2010. "Citation Metrics: Serious Drawbacks, Perverse Incentives, and Strategic Options for Heterodox Economics." *American Journal of Economics and Sociology* 69(5):1376–1408. doi: 10.1111/j.1536-7150.2010.00750.x.
- Lancho-Barrantes, Barbara S., and Francisco J. Cantu-Ortiz. 2021. "Quantifying the Publication Preferences of Leading Research Universities." *Scientometrics*. doi: 10.1007/s11192-020-03790-1.
- Larivière, Vincent, Yves Gingras, and Éric Archambault. 2009. "The Decline in the Concentration of Citations, 1900-2007." *Journal of the American Society for Information Science and Technology* 60(4):858–62. doi: 10.1002/asi.21011.
- Medoff, Marshall H. 2006. "Evidence of a Harvard and Chicago Matthew Effect." *Journal of Economic Methodology* 13(4):485–506. doi: 10.1080/13501780601049079.
- Merton, R. K. 1968. "The Matthew Effect in Science: The Reward and Communication Systems of Science Are Considered." *Science (New York, N.Y.)* 159(3810):56–63. doi: 10.1126/science.159.3810.56.
- Nederhof, Anton J. 2008. "Policy Impact of Bibliometric Rankings of Research Performance of Departments and Individuals in Economics." *Scientometrics* 74(1):163–74. doi: 10.1007/s11192-008-0109-0.
- O'Hagan, John. 2021. "Top Graduate Programmes in Economics: Historical Evolution and Recent Evidence." *Kyklos* 74(3):378–95. doi: 10.1111/kykl.12268.
- Önder, Ali Sina, and Sascha Schweitzer. 2017. "Catching up or Falling behind? Promising Changes and Persistent Patterns across Cohorts of Economics PhDs in German-Speaking Countries from 1991 to 2008." *Scientometrics* 110(3):1297–1331. doi: 10.1007/s11192-016-2222-9.
- Powdthavee, Nattavudh, Yohanes E. Riyanto, and Jack L. Knetsch. 2018. "Lower-Rated Publications Do Lower Academics' Judgments of Publication Lists: Evidence from a Survey Experiment of Economists." *Journal of Economic Psychology* 66:33–44. doi: 10.1016/j.joep.2018.04.003.

- Serrano, Roberto. 2018. *Top5itis*. SSRN Scholarly Paper. 3103083. Rochester, NY: Social Science Research Network. doi: 10.2139/ssrn.3103083.
- de Solla Price, Derek J. 1965. "Networks of Scientific Papers." *Science* 149(3683):510. doi: 10.1126/science.149.3683.510.
- Stockhammer, Engelbert, Quirin Dammerer, and Sukriti Kapur. 2021. "The Research Excellence Framework 2014, Journal Ratings and the Marginalisation of Heterodox Economics." *Cambridge Journal of Economics* 45(2):243–69. doi: 10.1093/cje/beaa054.
- Sutter, Matthias, and Martin G. Kocher. 2001. "Power Laws of Research Output. Evidence for Journals of Economics." *Scientometrics* 51(2):405–14. doi: 10.1023/A:1012757802706.
- Wallace, Matthew L., Vincent Larivière, and Yves Gingras. 2012. "A Small World of Citations? The Influence of Collaboration Networks on Citation Practices" edited by P. Holme. *PLoS ONE* 7(3):e33339. doi: 10.1371/journal.pone.0033339.
- Yuret, Tolga. 2020. "Co-Worker Network: How Closely Are Researchers Who Published in the Top Five Economics Journals Related?" *Scientometrics* 124(3):2301–17. doi: 10.1007/s11192-020-03589-0.

7. Appendix

Figure A1. Most important affiliations in top30 journals: H&R vs. replication. Ranks #16-30. The affiliations are ordered according to their relative share in the replication study.

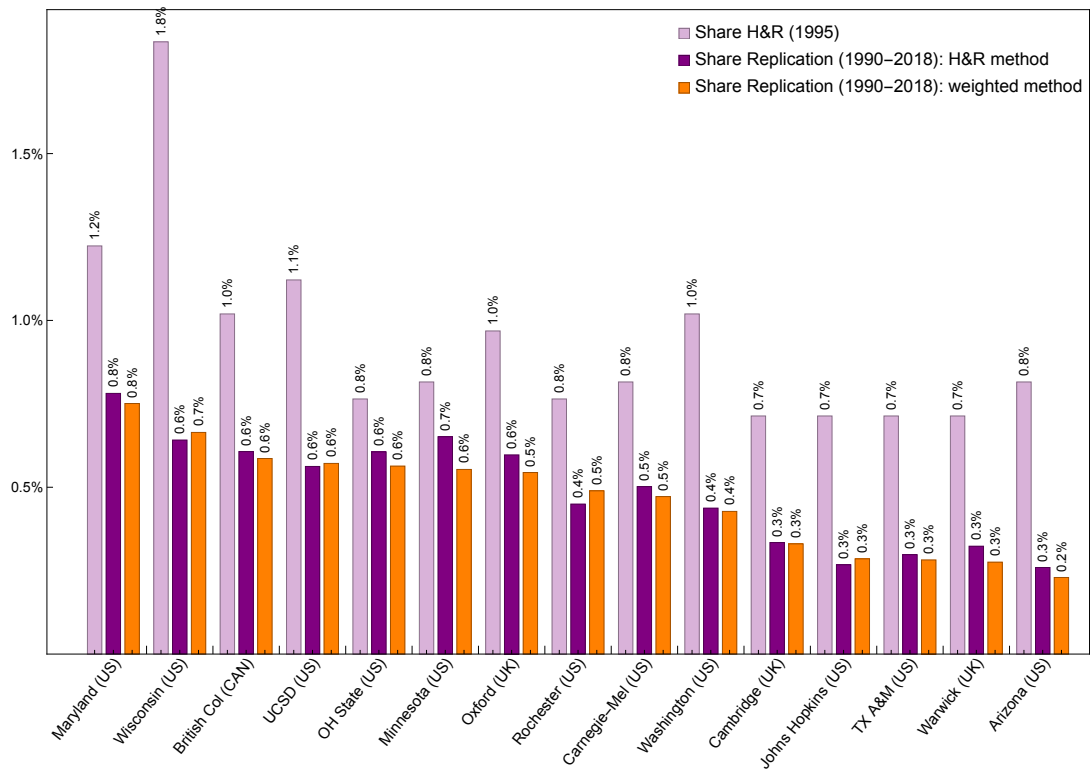


Figure A2a. Most prominent/important author affiliations among the top30 journals: journal-specific results.



Figure A2b. Most prominent/important author affiliations among the top30 journals: journal-specific results.

