

Alternatives for Transitioning of a Mechanistic National Research Evaluation System

Ali Maleki, Najmoddin Yazdi

Background

With a history spanning nearly two decades, Iran's recruitment and promotion of researchers, as well as graduation of students, are heavily influenced by quantitative bibliometrics, such as the number of publications, the impact factor (IF) and/or quartile of journals in which articles are published, whether the journal is

Hypothesis

- 1. Bibliometric indicators are not problematic in and of themselves, but the use of obsolete ones is.
- The culture of the scientific community is required for peer review to be beneficial.
- r. Transitioning away from a mechanistic research evaluation system necessitates recognizing the present capabilities, risks, and possibilities of the responsible scientific community.

Results

Numerous Iranian scholars desire a revolution that will result in a significantly increased role for relevance (i.e., addressing societal challenges and resolving local problems rather primarily pursuing excellence or quantity), peer review, and internationalization. However, it appears implausible. Rather than that, an incremental transition is more likely, in which windows of opportunity for change are captured.

For instance, the country is currently witnessing a shift away from rudimentary and primitive bibliometric indicators such as the impact factor or quartile ranking of journals in the Scopus database. This can be improved by triggering more

Future Work

Comparative analyses of national research evaluation systems that rely excessively on scientometric indicators may provide additional insight on this issue. Transitioning successfully could potentially be an intriguing research topic in this sense. Lastly, examining instances in which peer review has played a restricting or destructive role in the advancement of the research community can aid in gaining a better understanding of the context of this frequently supported method to research evaluation systems.

indexed in a specific database such as Web of Science (WoS), and the h-index of scholars. This has resulted in a highly mechanistic structure for evaluating research, with little room for expert judgment. How can this system of research evaluation be transformed into a more equitable and efficient one is our question?

Methodology

Field research and semi-structured interviews were used to collect data for this qualitative study. The study's sample population included Iranian scientometrics experts and policy designers and analysts in this regard.

sophisticated and cutting-edge indicators such as Impact Per Publication (IPP) or Source-Normalized Impact Per Paper (SNIP), which take into account both discipline differences and journal quality. This is, of course, still a game within the confines of metric-based systems, but it improves the system of research evaluation across disciplines and between junior and senior scholars. As another example, we can point to Iran's National Science Foundation (INSF) as a recent example of the emergence of a peer-reviewed niche evaluation system. Diagnosing, broadening, and promoting this system should thus be on the agenda of science policymakers in order to gradually infuse a peer review culture into a highly mechanistic national research evaluation system. Additionally, this approach may result in a more diverse research evaluation system.

Bibliography

- Gläser, J., Laudel, G., ۲۰۱٦. Governing Science: How Science Policy Shapes Research Content. European Journal of Sociology / Archives Européennes de Sociologie ۵۷, ۱۱۷–۱٦٨. https://doi.org/) /f^jhdc
- Gläser, J., Whitley, R., Y., The changing governance of the sciences: The advent of research evaluation systems. Springer.

- Pardo Guerra, J.P., ۲۰۲۰. Research metrics, labor markets, and epistemic change: evidence from Britain ۱۹۷۰-۲۰۱۸ (preprint). SocArXiv. https://doi.org/1.77175/osf.io/yzkfu
- Rijcke, S. de, Wouters, P.F., Rushforth, A.D., Franssen, T.P., Hammarfelt, B., ۲۰۱٦. Evaluation practices and effects of indicator use—a literature review. Res Eval ۲۰, ۱٦١–۱٦٩. https://doi.org/1...\17/reseval/rvv.\\\
- Saltelli, A., Di Fiore, M., ۲۰۲۰. From sociology of quantification to ethics of quantification. Humanities and Social Sciences Communications Y, Y=A. https://doi.org/Y/gg/qvc
- Welsh, J., ۲۰۲۱. Stratifying academia: ranking, oligarchy and the market-myth in academic audit regimes. Soc Anthropol ۱٤٦٩-۸٦٧٦,١٣٠٩٧. https://doi.org/1./gm/org
- Wróblewska, M.N., ۲۰۲۱. Research impact evaluation and academic discourse. Humanities and Social Sciences Communications ^, 1–17. https://doi.org/1./gh7^7m.