Editorial/Éditorial

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Create Impact

Heisenberg's Uncertainty Principle¹: The position and the velocity of an object cannot both be measured exactly, at the same time, even in theory. The very concepts of exact position and exact velocity together, in fact, have no meaning in nature. Any attempt to measure precisely the velocity of a subatomic particle will knock it about in an unpredictable way, so that a simultaneous measurement of its position has no validity. This result has nothing to do with inadequacies in the measuring instruments, the technique, or the observer; it arises out of the intimate connection in nature between particles and waves in the realm of subatomic dimensions.

Measuring a system usually disturbs it. The more precise the measurement, the shorter its timescale, the greater the energy of the disturbance and the greater the unpredictability of the outcome.

Michael McIntyre, 2001

¹ Taken from Encyclopedia Britannica. Retrieved: https://www.britannica.com/science/uncertainty-principle

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Within the scholarly community there is a growing obsession with measuring research impact. Journals are ranked using a variety of impact scores—SCImago Journal Rankings (SJR), Source Normalized Impact Scores (SNIS), Impact Factor (IF) scores, Eigenfactor scores, among others—and researchers themselves are characterized by h-indexes, citation rates, and productivity counts. Even knowledge mobilization websites intended to promote and support research distribution construct their own scales and metrics to measure impact (e.g., ResearchGate's RG score). The impact agenda with its focus on measurement is spurred by the ever-evolving accountability climate in which we conduct our research, and the increasing need to demonstrate the value of our scholarship to funding agencies and community stakeholders. This agenda has worked, in part, to make our scholarship more visible and to encourage its wider dissemination and adoption. As recognized by the Social Sciences and Humanities Research Council of Canada (SSHRC), "the use of impact assessments can bring substantial benefits to the research community, including enabling the community to better communicate its value, encouraging developments in research and teaching, and—fundamentally—helping the community and ways to increase its already substantial impacts across society" (SSHRC, 2017, p. 26). Yet, as also recognized, many of the existing measures are limited in their scope to account for how social science research influences communities beyond the academy; the majority of impact scores and indexes summarize citation rates from across academic publications, noting impact amongst researchers. Therefore, the challenge is not with the focus on impact, for this is a valuable end goal for all researchers, but rather on the quantification of impact and the associated industry that has emerged.

Our concern is optimized through Heisenberg's Uncertainty Principle. To measure an object in motion—research into practice—is to disturb the object. The object, in this case, is the act of doing research. When our preoccupation with increasing h-scores (largely a measure of quantity and citation rates), or any other impact measure, displaces our occupation as researchers to serve communities, academic and otherwise, the outcomes of our efforts displace in unpredictable ways. As journal editors, we are perpetually confronted by Heisenberg's Principle. We could boost CJE's impact score without too much difficulty by publishing far fewer articles thereby driving up our rejection rate (which is already between 75 and 80%) and promoting widely the few articles published. Yet, this is not our ambition. Chasing a high journal impact score in this manner would

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undermine our core mission as journal: to represent the valuable contributions that Canadian scholars in education continue to make to the field and to be a forum for authors to share ideas and connect theory to practice in meaningful ways for the education community in Canada and beyond, by fostering understanding and societal betterment through the publication of articles describing research-generated insights and solutions. We are a journal that aims to accept a broad range of articles and that represent the research endeavours of authors from across our country and beyond. To subject this aim to a narrow conception of impact measurement runs the risk of provoking disturbance within it, lessening the extent to which our aims can be realized, as Heisenberg's Principle recognizes.

In response to the impact agenda, and in alignment with the vision of SSHRC, we argue for more robust indicators of research that extend beyond singular score calculations. In their report, Approaches to Assessing Impacts in the Humanities and Social Sciences, SSHRC makes sensible recommendations that can guide the way we can operate within the pervasive accountability climate, shaping discourse regarding the validity and value of our work. These recommendations include: (a) defining impact broadly; (b) using diverse and flexible sets of indicators, including qualitative and quantitative methods; (c) leading research impact by collaborating with research partners and users; (d) assessing collective impact with recognition that social impact often requires extensive time; and (e) developing institutional supports to enable effective impact assessments (SSHRC, 2017, p. 27). In this way, SSHRC is calling on us to use our skill sets as social researchers—the full range of inquiry methods that can be employed within the humanities and social sciences—to describe and narrate our work and its influence. More importantly, we are called to connect and generate scholarship with those communities that are most related to our work in order to create impact, thus making our scholarship ecologically meaningful to the social contexts which we study.

References

Social Sciences and Humanities Research Council of Canada. (2017). *Approaches to Assessing Impacts in the Humanities and Social Sciences*. Ottawa, ON: Author.