

Editorial

Journals in the Developing World

Estimates of the number of research journals published worldwide vary from 50,000-70,000. The majority of them are edited and published in the so-called developed world and publish research conducted by scholars employed by academic, government, industrial, and private institutions. The research credibility comes in part from the peer review process, which relies on well-established and reasonably effective practices and protocols that are 150-200 years old. Research conducted in the developing world has historically been undertaken by “visiting” scholars, who have often used the developing world as a field resource in one form or another but published most of their work in their home countries.

Members of the local research communities in developing countries have historically been trained either in developed world countries or in local institutions established by colonial or other visiting institutions. Their research results have generally been submitted to developed country journals and subject to peer review by researchers working in the developed world climate. Unfortunately, the initial glow of local journals established in developing world countries has too often been short-lived because of poor funding and inadequate editorial resources. It is also a fact that outside evaluation of published research, and hence of the authors, has been strongly biased by the belief that the best research is published in the “top” journals. For example, major Chinese research institutions are now judged by publication in “top” journals, resulting in a removal of research resources from vital areas such as biodiversity and effectively disenfranchising those who are studying the local biota and may not be functional in English, the current *lingua franca* of scientific publishing.

Iain E.P. Taylor, Professor of Botany and Research Director,
UBC Botanical Garden and Centre for Plant Research,
6804 SW Marine Drive, Vancouver, BC, Canada, V6T 1Z4.
iain.taylor@ubc.ca

Davidsonia has the resources that allow it to search for, peer review and publish high-quality papers on north temperate natural history, traditional taxonomy and ecology. The paper by Turner and Wilson on the ethnobotanical gardens on Haida Gwaii, in this issue is an example of such work. Similarly motivated journals in the developing world (often tropical), which is where many of the biodiversity hotspots exist, are absolutely essential to proper documentation of the biota in these areas. Editors and scientists who have resources, or can get them, have a strong obligation to assist local journals to find and nurture the local talent of authors, peer-reviewers and editors who are essential to the world wide effort to publish internationally acceptable reports of systematic, biogeographical, and ecological botany.

I see three major first steps. First, local researchers must know the criteria that will provide international acceptance for their work. This can be achieved at international conferences and whenever there are visitors to or from developing countries. Second, the editorial community worldwide must continue to require peer review, but recognize and accept that selection of reviewers by journals in developing countries is usually best achieved from the pool of contributing authors and their associates in those same countries. Third, the Search Engine companies must recognize that the enabling power of computing requires them to search for and index all peer reviewed journals worldwide and to ensure that access to those resources is also worldwide.

While the high-profile expertise may often be in the developed world, there are many experts, in for example the clinical science associated with Ebola or the biogeographical understanding of a local flora in the developing world, who can provide thorough, critical and competent reviews of research undertaken in their own country. They bring expertise of local issues that may well improve the reporting of work by considering those local issues. This does not exclude the international heavyweights in the field, but it may bring more reality to interpretations of a paper's "importance."

All researchers need access to the full range of research literature. We will never know how much developed world effort has been wasted when basic information from the developing world is known locally but not published.