

Guest Editorial

Quality assurance is required of all products and services to be accepted in the increasingly competitive marketplace. A technical or scientific journal is both a product and a service albeit for a very special and limited but global market. Our editorial team at Drying Technology is constantly striving to increase the value of the journal to the, sometimes, divergent requirements of academia and industry. Yet, we must try to do so since drying science, technology and engineering is a multi- and trans-disciplinary discipline of industrial interest. A purely curiosity-driven work, however noble, with no long-term merit from an industrial point of view cannot be viewed as something worthwhile from the standpoint of drying technology.

The goal of archival publication in engineering and technology should not be to address only an academic readership; we need to do so since no work is the final word by itself and hence other academics need to read, critically examine and hopefully enhance and take the step towards eventual industrial application via technology transfer. The final goal should not be another academic paper but a potential application; the former leads to citations while the latter leads to economic impact of societal benefit. Unfortunately, only the former can be easily measured using some quantifiable criteria and simple measurements but the quality and impact of the publication generally cannot be quantified. A system of evaluation commonly practiced by academic institutions and granting agencies around the world uses the easily accessible citation analysis and journal impact factors to determine if the research is meritorious (and hence fundable) or not.

Thus, the impact of the impact factor itself is being felt by academic researchers worldwide. Whether it is significantly distorting the nature of engineering research and publication policies and selection of journals will not be known until proper research and bibliometric analyses are made stretching many disciplines. For example, an engineering researcher may choose to publish in an applied physics journal a paper that may be more likely to be read by mechanical engineers who access engineering journals. Science journals have higher impact factors (for various reasons), which can be the main incentive for this choice. A biology researcher may choose a biomedical or even medical journal to disseminate his/her work since the latter journals have much higher impact factors than science journals. It is obvious that journals should be selected based not only on their quality but also on their readership profile.

A recent study from Slovak Republic (Podlubny, 2005) clearly shows the huge differences that are evident between citations with disciplines. Mathematics, for example, has the lowest citation rate while biomedical sciences have the highest, almost two orders-of-magnitude higher. Physics on average gets four times as many citations as engineering papers. The author of this study has in fact provided a logical normalized way of assessing comparative impact of authors in different disciplines. Taking Mathematics citations as unity, the author concludes that the citation numbers are 5, 8, 15, 19, and 78 for engineering/technology, biology, chemistry, physics and biomedical research, respectively. One engineering citation is thus equivalent to 4 in Physics and over 15 in biomedicine, for example.

Our Editor-in-Chief, Professor A.S. Mujumdar has discussed in his editorials the various complicating issues related to citations and impact factor related to engineering and technology journals. Readers are invited to look them up. They are also archived at his website <http://serve.me.nus.edu.sg/arun/>. Comments from our readers are always welcome.

I am pleased to note that the impact factor for Drying Technology has been rising continuously over the past four years and has reached 1.029 for 2005; a respectable number for a technology journal, a significant readership of which does not publish archived papers unlike the readership of purely scientific journals. Nevertheless, our editorial team believes that the true value and impact of the journal is reflected by the intrinsic quality of the work published and its utilization in improving industrial drying processes. This is not easy to gauge. We believe that our peer review process is rigorous and we attempt to accept papers of significant long or medium term value to industrial operations. The journal also provides a vehicle for worldwide dissemination and archival of relevant technical literature, and thus opportunities to remain up-to-date with latest information in drying R&D.

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