



Conflicts of interest

At the end of their survey of the way usage and frequency of occurrence of the phrase “conflict of interests” has occurred in the magazine *Science* since it began publication in 1880, Gingras and Gosselin remark that “the scientific community is now adapting its norms and practices to a situation where the ‘republic of science’ is no more taken for granted” [1]. One such adaptation is the requirement imposed by many journals on authors submitting papers to include a declaration of conflicts of interests, which declaration is normally printed towards the end of the article immediately before or after the acknowledgments. Since, in nearly every case where such a statement appears, there is an explicit declaration of no conflict, the declaration has acquired something of the meaninglessness and superfluity of the statements automatically pasted at the bottom of Internet messages (e.g., “this e-mail may contain confidential information ... if you are not the intended recipient ... please telephone the sender immediately and permanently delete the message from your system”). It is not the intention here to reinforce the already very considerable literature on the topic of “conflict of interest”, but merely to point out a few aspects that appear to be missing from the debate.

The bald statement printed in a journal leaves open the exact nature of the conflict. Presumably it is the opposition of the disinterested pursuit of the truth to venal interests. The International Committee of Medical Journal Editors (it should be mentioned that the main focus of attention regarding conflicts is medical, especially clinical, research) has developed a unified disclosure form for declaring potential conflicts that renders them more explicit. It asks authors to disclose: (1) associations with commercial entities that provided support for the work reported in the submitted manuscript; (2) associations with commercial entities that could be viewed as having an interest in the general area of the submitted manuscript; and (3) nonfinancial associations that may be relevant or seen as relevant to the submitted manuscript. The *British Medical Journal*, for example, defines a competing interest (synonymous

with conflict of interest) as existing “when professional judgement concerning a primary interest (such as patients’ welfare or the validity of research) may be influenced by a secondary interest (such as financial gain or personal rivalry).

Such a definition, and the accompanying requirement to declare it, combines naïvety with a lack of realism. The most basic flaw resides in the fact that it is obvious that an unscrupulous author would take care not to reveal any conflict. The appearance of a declaration of no conflict of interest can, therefore, scarcely be considered reassuring. But “the validity of [the] research”? Some of the norms of the disinterested pursuit of truth were explicitly formalized, very recently compared with the overall span of the history of science, by the sociologist R.K. Merton [2]. Presumably, failure to comply with these norms would cast doubt on the validity of the research. But is it practically realistic to carry out such an assessment?—not least because much science nowadays is so badly reported it is often not possible to reconstruct exactly what was done.

Then there is the assumption that any commercial association, in which money is paid (by a commercial organization) to finance the research, leads to distortion. Admittedly there have been some notorious cases (e.g., [3]). But given the enormous reputational risk to a pharmaceutical company selling a drug that turns out to have deleterious consequences, it would appear to make sound commercial sense to take great pains to make sure that all the trials of the drug are as reliably informative as possible.^{1,2}

In contrast, academic research nowadays, with all the pressures to maintain grant income and keep publishing, has every reason to distort results. In an article about forecasting in personalized medicine, Ioannidis makes some revealing comments [4]: “Contrary to the hype, personalized medicine has largely failed to match its promises ... There is an ongoing chase to find and report something statistically significant, since this will facilitate publication. The discussion of the findings is typically overstated ... There is often no serious intention to prove the presence and magnitude of

¹ It often appears to be assumed that companies put enormous pressures on contracted consultants to deliver results favourable to the company’s products. But, as has just been stated, a company of any standing has little interest in selling inherently flawed products. It is far more likely that *prévenance* comes into play—the consultant, perhaps even unconsciously, has the desire to please the company that provides him or her with a living.

² Admittedly a possible strategy could be to reap enormous profits from a defective product before the defects become apparent, or before the lawsuits establishing liability come to fruition, and liquidate the company in advance of any financial penalties. Something along those lines appeared to happen with the Dow Corning company that became the major manufacturer of silicone breast implants and filed for bankruptcy protection in 1995 after being overwhelmed by claims for damages from implant users.

the proposed prognostic effect ...”. And then, discussing what the reasons for such distortion might be, “until now most prognostic information has had no commercial sponsors to move it into the market.”

Such distortion not only concerns the individual academic researcher, but also implicates his or her institution. Very few research institutes nowadays are so well endowed that they do not depend on external income. The ability of a university to pay salaries to its staff depends, to a degree that does not appear to have been hitherto quantified, on its ability to attract funding, often regardless of the source.³ Typically the largest provider of funds is the State; hence, inevitably, the University becomes an instrument of State policy—which is often determined by the venal desires of individual ministers

Occupational medicine seems to have a particularly rich history of conflicts of interest. A recent example is a paper by de Ree et al. [6], which assesses the health risk of exposure to tricresyl phosphates in aircraft (and concludes that there is, essentially, none). In the “Conflict of interest statement”, one reads that all but three of the seven authors are employed by or act as contracted or independent advisers to KLM Health Services. It seems obvious that an airline company has a strong interest, at least in the short term, in confuting any association between ill health and exposure to aircraft cabin air. The conflict is, however, somewhat more subtle than what seems obvious. The company is doubtless insured against the cost of claims for liability; most insurance policies include a clause prohibiting any admission of liability before any court of law (including higher courts of appeal) definitively, at least in the legal sense, settles the matter. What is surprising is that despite this very obvious and strong conflict of interest, the journal editor nevertheless published the paper.⁴ An earlier case is referred to by Cross elsewhere in this issue [7]. It

concerns the admission of liability by the UK government for the Camelford (Cornwall) mass poisoning disaster. At the time, the water company that supplied the poisoned drinking water was a state enterprise, but all the water companies were being prepared for privatization, and it was considered that any admission of negligence and liability would have had a strongly deleterious effect on the viability of the privatization process.

Undoubtedly the issue of conflict of interest is a real one, and its ramifications need further exploration and analysis. Meanwhile, *JBPC* prefers to continue to take adherence to the values of the “republic of science” for granted and assume that if any conflict were to exist that had distorted the content of a paper, the authors would refrain from submitting it.

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³ See [5] for an egregious example involving the London School of Economics.

⁴ Intriguingly, the statement is followed by the cryptic announcement that “The Transparency [*sic*] document associated with this article can be found in the online version.”