

Conflicts of interest in academic publishing: when in doubt, declare!

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Science being the pursuit of truth, its reporting and interpretation need to be unbiased, and this should always remain its primary objective. Biases that can colour this primary objective are referred to as conflicts of interest (COI).¹ Increasingly, the need to declare potential COIs is being recognised from all those involved in the publication process, i.e. authors, peer reviewers and editors/editorial staff. The International Committee of Medical Journal Editors (ICMJE) lays out considerations for potential COIs for the above three groups.² We outline the current understanding of COIs with respect to the publication of scientific manuscripts.

Broadly, COIs could be financial or nonfinancial. Financial COIs refer to the potential for financial gain resulting from the publication of a manuscript. This could result from financial relationships (fees, grants or stocks) with companies (or competing companies) producing a drug or product being discussed in the paper. Financial COIs could be relevant to oneself or to one's close relations, such as spouses.³ Nonfinancial COIs are broader, often more complex than financial COIs,^{4,5} and could result from prestige with the publication of the paper (or the loss of prestige of a competitor from nonpublication), propriety of an idea [intellectual property rights (IPR) between two competing research groups working independently on the same idea] or unethical appropriation of the research idea of a competing group. It is imperative to disclose COIs, whether financial or nonfinancial, regardless of whether one is the author, reviewer or editor dealing with a manuscript.¹ In this context, it must be noted that with the strictest interpretation of COI, no paper may be truly free of COIs, since most authors would desire publication of their work, and the prestige that this brings.

Author COIs are widely understood. Authors should transparently declare potential COIs at the time of manuscript submission, either in the covering letter or in a dedicated form provided by the ICMJE (available since 2010).⁶ This

form lays out the broad categories under which COIs, financial and nonfinancial, are required to be declared by authors. The ICMJE mandates declaration under four headings: financial COI relevant to the present manuscript; those financial relationships in the past 3 years not necessarily relevant to the present manuscript; any COI relevant to IPR; and, the broad category of any other COI the author might want to disclose. The form is filled electronically,⁶ and a significant proportion of journals, including this journal, mandate electronically filled ICMJE COI forms, completed by all authors, to be made available to the editorial office either at submission or before acceptance of a manuscript.

Reviewer COIs are also generally asked of reviewers at the time they are invited to peer review a manuscript. These could be considerations (financial or otherwise) that might compromise their objective evaluation of a study. Generally, if such COIs exist, then peer reviewers are either expected to declare them transparently to the handling editor, or refuse to evaluate the said manuscript. If in doubt whether a particular interest serves as a significant COI, it is best to discuss this with the handling editor before submitting one's judgement on the manuscript. Furthermore, since peer reviewers are privy to results before these are published to the world at large, it is essential that reviewers should not utilise this privilege for their own academic gain, such as by appropriating the idea of a study they are reviewing as their own, and working on the subject of interest before it is published,⁷ while possibly blocking the publication of the idea, by means of hostile reviews.² Needless to say, one should not peer review one's own manuscript, and while this might sound preposterous, there exist numerous instances of peer review fraud where this has happened.⁸

Editor COIs are the least understood category of COIs. Akin to peer reviewers, editors are also privy to scientific information before it is published, and, therefore, must not misappropriate others' ideas as their own. Furthermore, it may be considered

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Table 1 Examples of potential COIs for authors, reviewers and editors, with suggested remedies

Example of COI	Suggested mechanisms for handling the COI
Author	
Financial gain from the publication of an innovation	Declare financial relationships with the said innovation transparently If a study has been funded by the company producing/marketing the innovation, then the said company should not participate in the analysis of data from the study or writing of the manuscript, while transparently declaring the COI
Social gain, e.g. prestige from the publication of a manuscript	Unavoidable in most instances. Take care to avoid inflating the implications of your study beyond those reasonably acceptable
Peer reviewer	
Academic gain from the promotion of research of collaborators, or suppression of work of competitors	Decline to review when such COIs exist If you feel that your objectivity shall not be impaired when you review such a manuscript, ensure that such association with authors as collaborators or competitors is known to the handling editor
Unethical promotion of one's own work, e.g. by seeking self-citations	Avoid requests to cite your work unless this is absolutely essential for the appropriate understanding of the work under question. Any such requests to self-cite should only be suggestions, and not citing your work can never be a consideration determining the acceptance or rejection of the manuscript in question
Misappropriation of IPRs, e.g. suppressing publication of a work, while working on the idea of the authors yourself, and attempting to publish it before the authors successfully do so ⁶	Ethically inappropriate behaviour – should be avoided at all costs
Editor	
Misappropriation of IPRs	Ethically inappropriate behaviour – should be avoided at all costs
Dealing with manuscripts of collaborators or competitors	The handling editor should never be the final authority on manuscripts of collaborators or competitors. If this is the EiC, they should delegate this responsibility to other editors. If editors other than the EiC are in this position, then they should ensure that the EiC is aware of such potential COIs. The EiC should keep in mind the existence of such COIs before providing a final decision

COI: conflict of interest; EiC: Editor-in-Chief; IPR: intellectual property rights

inappropriate to serve as the final authority determining the acceptance or rejection of a manuscript when there exists clear potential for financial or academic gains for oneself, or losses for competing groups, should a conflicted editor judge the said manuscript. It is strongly recommended that journals should have a declared policy regarding editorial handling of manuscripts in order to avoid such potential editorial COIs.² Table 1 provides examples of COIs in academic publishing, and suggestions regarding how these should be dealt with.

Despite the clear recognition for the need to consider and declare COIs for authors, reviewers and editors by the ICMJE,² COI declaration in real-life remains suboptimal.⁹ A survey of the editorial policies of more than 300 biomedical journals revealed the recognition of author COI declaration in >80%, but of peer reviewer COIs in only one-third, and editor COIs in less than one-fifth of the journals.¹⁰ Analysis of nearly 200 respondent authors of Cochrane reviews from low- and middle-income countries revealed that nearly one-quarter of respondents did not think it necessary to declare their or their spouses financial relationships even though these might have been relevant to the study in question, and 40% were aware

of such occurrences of undeclared COIs occurring at their institutions.³ Another analysis of declarations of financial COIs from 703 editors for 60 journals from a developed country revealed that only about one-half of such journals had such declared COIs available with them, and about one-fifth of such declared COIs were visible publicly.¹¹ A similar lack of compliance with COI declarations have also been noted amongst authors of editorials from even the most impactful journals.¹² This suggests that the present lack of transparency with COIs is a global phenomenon. There are no easy remedies for this problem. Journals must attempt to keep pace with the existing best practices in academic publishing,¹³ and instruct authors to declare COIs, liberally using the ICMJE COI form. They should also have transparent editorial policies regarding COIs for reviewers and editorial staff, and ensure these are strictly implemented. Existing editors and peer reviewers should educate authors, as well as reviewer and editor colleagues, about the necessity to disclose potential COIs. When in doubt about whether a particular interest remains a COI, it is best to transparently declare this, to avoid future questions regarding the work being authored or evaluated. 

References

- 1 Gasparyan AY, Ayzvazyan L, Akazhanov NA et al. Conflicts of interest in biomedical publications: considerations for authors, peer reviewers, and editors. *Croat Med J* 2013; 54: 600–8.
- 2 2018 ICMJE recommendations. <http://www.icmje.org/icmje-recommendations.pdf> (accessed 11/08/19).
- 3 Rohwer A, Young T, Wager E et al. Authorship, plagiarism and conflict of interest: views and practices from low/middle-income country health researchers. *BMJ Open* 2017; 7: e018467.
- 4 Macklin R. Conflict of interest and bias in publication. *Indian J Med Ethics* 2016; 1: 219–22.
- 5 Nature journals tighten rules on non-financial conflicts. *Nature* 2018; 554: 6.
- 6 Drazen JM, de Leeuw PW, Laine C et al. Toward more uniform conflict disclosures – the updated ICMJE conflict of interest reporting form. *N Engl J Med* 2010; 363: 188–9.
- 7 Reviewer misconduct? – Example from the Committee on Publication Ethics. <https://publicationethics.org/case/reviewer-misconduct> (accessed 11/08/19).
- 8 Misra DP, Ravindran V, Agarwal V. Integrity of authorship and peer review practices: challenges and opportunities for improvement. *J Korean Med Sci* 2018; 33: 14.
- 9 Breimer LH, Nilsson TK, Breimer ME. Declarations of conflict of interest are still inadequate. *Indian J Med Ethics* 2018; 3: 256–7.
- 10 Dal-Re R, Marusic A. Are journals following the ICMJE recommendations complying with conflicts of interest disclosure policies. *Eur J Intern Med* 2018; 57: e17–9.
- 11 Haque W, Minhajuddin A, Gupta A et al. Conflicts of interest of editors of medical journals. *PLoS One* 2018; 13: e0197141.
- 12 Kaestner V, Prasad V. Financial conflicts of interest among editorialists in high-impact journals. *Blood Cancer J* 2017; 7: e611.
- 13 Gasparyan AY, Yessirkepov M, Voronov AA et al. Updated editorial guidance for quality and reliability of research output. *J Korean Med Sci* 2018; 33: e247.