

**Principles and Ethical Guidelines for Editors, Authors,
and Reviewers to *Chemical Engineering Education***

Overarching Principles

Below are a set of overarching principles towards ethical processes and practices for *Chemical Engineering Education* (CEE). These principles are drawn from (Royal Society of Chemistry¹, Guest Editorial in Journal of Engineering Education², Society of Professional Journalists Code of Ethics³, Cell Press editorial ethics⁴, Wiley: creating a journal DEI statement⁵, and ACS Ethical Guidelines⁶). Resources on current nascent challenges in our profession can be found by engaging with ASEE's Commission on Diversity Equity and Inclusion (CDEI).

Education and assessment activities within chemical engineering contain elements of subjectivity from the Editorial Team, authors, reviewers, readers, and others involved in the process. As such, it is imperative that high ethical standards are employed at all stages in the publication process. This code of ethics outlines how CEE will operate, with the following overarching principles guiding our activities:

1. Display integrity by seeking truth and communicating relevant and substantive perspectives in an inclusive manner. This requires actively seeking sources that have been traditionally overlooked. Further, assessment/evaluation techniques and processes drawn from other disciplines (qualitative assessments, mixed methods, storytelling, etc.) are also encouraged.
2. Strive to ensure all individuals within the peer review processes are rigorous, fair, polite, respectful, and timely. Decisions are derived from evidence that relies on the content and quality of submissions.
3. Promote “constructive, professional dialogue between authors, reviewers, and our editorial teams.”⁷
4. Recognize that the published content reflects the context of societal constructs and priorities at the time of publication. Thus, content may need to be curated, seeking sources that acknowledge shifting knowledge and perspectives over time.
5. Acknowledge and work to avoid conflicts of interest.
6. Directly acknowledge ethical considerations and, in all roles, hold oneself to the highest standards of equity, inclusiveness, and fairness.

¹ Royal Society of Chemistry <https://www.rsc.org/new-perspectives/talent/joint-commitment-for-action-inclusion-and-diversity-in-publishing/>

² Coley, B.C., Simmons, D.R. and Lord, S.M. (2021), Dissolving the margins: *LEANING IN* to an antiracist review process. *J Eng Educ*, 110: 8-14. <https://doi.org/10.1002/jee.20375> <https://onlinelibrary.wiley.com/doi/pdf/10.1002/jee.20375>

³ SPJ Code of Ethics <https://www.spj.org/ethicscode.asp>

⁴ Cell Press editorial ethics <https://www.cell.com/editorialethics>

⁵ Wiley <https://www.wiley.com/network/archive/how-to-create-a-journal-diversity-equity-inclusion-statement>

⁶ Ethical Guidelines <https://pubs.acs.org/pb-assets/documents/policy/EthicalGuidelines-1593528502597.pdf>

⁷ Cell Press editorial ethics <https://www.cell.com/editorialethics>

Ethical Obligations of Editorial Team

1. All members of the CEE Editorial Team (hereafter called “Editorial Team”) should give unbiased consideration to all manuscripts submitted for publication, judging each on its merits alone. The Editorial Team, however, may consider other recent or concurrent submissions made by the same author or authors when considering a manuscript.
2. The Editor of CEE (hereafter called “Editor”) shall take ultimate responsibility for the acceptance or rejection of any manuscript. Such decisions are expected to be made in consultation with external reviews provided by those with the expertise to make such judgements. The Editor may reject manuscripts without external review if the manuscript is considered to be inappropriate to the scope and mission of the journal, to exceed the maximum length, to not follow the journal’s stylistic or grammatical standards, etc. It would be typical for the Editor to explain, if only briefly, to the author(s) why the manuscript is being rejected at this initial stage. As appropriate, the Editor may identify where changes could be made for the submission to be resubmitted for consideration.
3. All members of the Editorial Team should respect that authors have independence in how information is presented within their own work. However, journal style, length, technical justification, and common sense should prevail when making edits at any stage, including after an article has been accepted for publication.
4. Members of the Editorial Team should annually participate in professional development addressing the latest techniques in recognizing bias in articles, peer-review critiques, and the peer-review process. Editorial Team members are expected to provide professional, polite, and constructive feedback to the author and should identify and redact reviews that do not meet these expectations.
5. An Editorial Team member should not be involved in the acceptance or rejection of any manuscript where they are an author. In the case of the Editor submitting a general manuscript to the journal, the CEE Publications Board Chair will designate an appropriate Associate Editor to manage acceptance or rejection of the submission.
6. A “Paper Editor” is a member of the CEE Editorial Team who is assigned the managerial tasks associated with a paper from assignment to decision. Accordingly, it is the responsibility of all members of the Editorial Team to work to identify potential conflicts of interest when serving as a Paper Editor and attempt to remove the conflict of interest should they be made aware of such a conflict. Examples would include: choosing a reviewer for a submitted manuscript who comes from the same institution/organization as one of the authors, choosing a reviewer from a Ph.D. advisor of one of the authors of a submitted manuscript, or choosing a reviewer from someone who is a recent (within five years) collaborator of one of the authors.
7. An author, during submission of a manuscript, may request that certain individuals are *not* used to review the manuscript. However, this should only be considered as guidance, and the ultimate decision rests with the Paper Editor. The author might also suggest potential reviewers in their submission, and this would fall under the constraints in item 6.

Ethical Obligations of Authors

1. All authors are expected to submit scholarly work that puts their submission within the context of what is known in the literature. The authors should intentionally select references that demonstrate broad and inclusive attribution of concepts/ideas and are germane to the present study.
2. Plagiarism and self-plagiarism are not allowed. Where an author wants to duplicate some sentences from a previously published work, quotation marks are to be used and the source cited. This should be used sparingly within a submission. Submitted manuscripts will be sampled for plagiarism.
3. For human subjects' research, authors must provide a statement (and IRB committee approval number) associated with the requirements of informed consent at an appropriate location within the submitted manuscript.
4. All authors should consider how to make their works concise prior to submission. This includes the value of impactful figure(s) and/or table(s) augmenting succinct narrative. Additionally, all authors should make their submission consistent with the journal requirements prior to submission. Using the Submission Template under Author Guidelines is highly encouraged to ensure consistency with journal standards.
5. Should an author consider submitting a multiple-part article, it is highly recommended that the author contacts the Editor ahead of time to discuss those plans. Each individual article, though potentially one part of a multiple-part submission, will be reviewed separately and must stand on its own. Articles must be unique and complimentary and avoid incremental updates to prior publications. Fragmentation of work consumes reviewer and editorial team time as well as using journal space; all are precious resources with associated costs.⁸
6. Occasionally an author will want to submit a work that has been published, in part, in another venue (such as conference proceedings). The CEE publications policy requires the following of such manuscripts: (1) the initial paper must be cited in the new submission, and (2) the authors must explain in the Introduction section how this new submission is enhanced over the previously published version. The expectation is that the new paper has at least 30% new material, though this is not a rigid requirement, but rather a guideline for the reviewers and Editor to use. As a reminder, authors must not self-plagiarize their own work – similar language is permissible, however.
7. Only those authors who made significant intellectual contributions to the work should be included in the author list. Inclusive recognitions should be provided in the Acknowledgments section of the submission.

⁸ Ethical Guidelines <https://pubs.acs.org/pb-assets/documents/policy/EthicalGuidelines-1593528502597.pdf>

8. All authors (via the corresponding author) must identify conflicts of interest that may impact the consideration of the submission and the results presented. This includes, but is not limited to, financial interests associated with a company or entity that could conceivably benefit from the results contained within the manuscript. Such information will be included in the manuscript during review and, if accepted, within the published article.
9. CEE does not prohibit the citation of in-press papers. Occasionally authors will cite a private conversation, but an Acknowledgment at the end of the manuscript is more appropriate. Papers submitted to CEE but not yet accepted can be cited in the *original* manuscript submission provided the author identifies a permanent designation when preparing their final draft materials for production. If a paper in the references was submitted but a decision about acceptance is not known when *production* files are handed off by the author, it should probably be eliminated by the author at that time.
10. It is improper for authors to submit the same (or very similar) manuscripts to multiple venues simultaneously such that they are both in review concurrently. Copies of any closely related manuscripts in press with other venues should be supplied to the Editor.

Ethical Obligations of Reviewers

1. Every chemical engineering educator should strongly consider serving as a reviewer, since the dissemination of information about our field requires a critical review from diverse experts and practitioners.
2. Selection of reviewers is based on, among other items, self-reported “reviewing interests” or expertise. If a reviewer is selected for a review but does not feel they are qualified to evaluate the information provided in the manuscript, they should reject the assignment (either when assigned or during the review process).
3. Should a reviewer feel that a conflict of interest exists with a work they have been assigned to review, they should reject the assignment or, if the conflict is identified during the review process, reject the assignment at that point, without submitting a review. Some examples of a conflict of interest include: reviewing a paper that has an author from your current institution, reviewing a paper from an academic advisor, reviewing a paper from a student you have supervised, and reviewing a paper from a colleague that you have worked with on a project during the past five years.
4. Whether a review is single-masked or double-masked, the reviewer must keep the fact that they have reviewed a manuscript confidential.
5. A reviewer is required to explain and support the judgements of their review, with sufficient information so that the Paper Editor may utilize this feedback in making a decision about manuscript acceptance. There is an opportunity to provide “Editor only” feedback on a review, and a reviewer should provide feedback in this section to the Paper Editor if they have content-related ethical questions.

6. A reviewer is expected to provide professional, polite, and constructive feedback to the author on the scientific and educational merit and credibility of the study^{9,10}. The Editorial Team may request that a review be edited or may redact portions of reviews that do not meet or exceed these quality standards.
7. A reviewer needs to act promptly when receiving a review assignment. This includes a decision on whether to accept or reject an assignment. Should a reviewer accept an assignment, the expectation is that they will respond with a review within the time frame specified. If they are delayed, they should report this to the Paper Editor making the assignment.

Ethical Obligations of CEE Editorial Team, Authors, and Reviewers as it Relates to Generative AI

1. Follow those practices and procedures outlined in the most-recent version of the “CEE Guidelines for Use of Generative Artificial Intelligence”, which is posted on the CEE website.

The above is a work of the Publications Board and the Editorial Team for Chemical Engineering Education. It is a living document in that it represents the collective perspectives of those affiliated with the journal at the start of 2022. This is version 1. It is anticipated the updates to this document will occur in the future as times, thoughts and individuals change. – D.P. Visco, Jr., Editor, CEE (2/1/22)

Changes:

Version 2: Directed individuals to the CEE Guidelines for Use of Generative Artificial Intelligence (approved TBD)

⁹ Silbiger NJ, Stubler AD. 2019. Unprofessional peer reviews disproportionately harm underrepresented groups in STEM. *PeerJ* 7:e8247 <https://doi.org/10.7717/peerj.8247>

¹⁰ Helen Le Sueur, Arianna Dagliati, Iain Buchan, Anthony D. Whetton, Glen P. Martin, Tim Dornan & Nophar Geifman (2020) Pride and prejudice – What can we learn from peer review?, *Medical Teacher*, 42:9, 1012-1018, DOI: [10.1080/0142159X.2020.1774527](https://doi.org/10.1080/0142159X.2020.1774527) <https://www.tandfonline.com/doi/full/10.1080/0142159X.2020.1774527>