

Errors in a Published Paper: Tips for Authors

[Keywords: Tips for Authors, Mistake In Published Paper]

What Constitutes an Error?

Mistakes in academic publishing happen for all sorts of reasons. They range from simple typographic errors to willful manipulation of findings or results. The way in which these [errors](#) are handled depends largely on their severity or magnitude and whether or not they occurred intentionally. Tips for authors as they respond to a mistake in a published paper will be based upon the classification of the error.

Unintentional errors include those associated with data collection or classification, statistical analysis, information that cannot be verified by a peer reviewer, typographical errors and misspellings, or labeling a figure as “on the right” or “on the left” when the opposite is true. Essentially, unintentional errors comprise mistakes that were not willful on the part of the author or publisher and do not compromise the outcomes of the research.

Intentional errors constitute academic misconduct and include concurrent submission of a single paper to multiple journals, conflicts of interest, fabrication or manipulation of data, noncompliance with research protocols, plagiarism, and dividing a manuscript into several small papers (“salami slicing”). In the language of the journal [Nature](#), academic misconduct “affects the publication record or the scientific integrity of the paper, or the reputation of the authors or the journal.”

Definitions of Error Types and Processing

For peer-reviewed content, *Nature* has defined four categories of error types and processing or “publishable amendments”:

- Erratum – notification of a significant error made by the journal
- Corrigendum – notification of a significant error made by the author(s). All authors must approve and sign the corrigenda (corrections document) or notification must be made of their dissenting opinions.
- Retraction – notification of invalid results. All coauthors must sign a retraction that explains the error and how it affected the conclusions. This will be submitted for publication and is the most consequential error type.
- Addendum – notification of additional information about a paper. This can include an Editorial Expression of Concern. It is attached to papers that editorial staff feel require additional explanation in order to be understood.

Journals Respond to a Published Error

The response to a published error will depend upon the nature of the error and the individual or organization calling attention to the problem. Typically, those who advise a journal of potential problems with a published paper are readers/other researchers, authors, editors,

publishers/journal owners, and members of the organization or institution from which the work was produced (universities and research labs).

In essence, there are two parties who must respond to an error in a published paper: the author(s) and journal editors. Let's start with journal editors. The [Council of Science Editors](#) believes assessments should be made on a case-by-case basis and lists considerations for editors faced with a mistake in a published paper:

- What is the nature of the correction request?
- Who is making the request?
- Who will write the correction?
- What wording should be used for the correction?
- When should the correction be published?
- When should the retracted article be removed from the online site?
- When is it acceptable to alter the HTML version of a published article?
- Is there a statute of limitations for publication of errata and/or retractions?
- Can the original (or different) authors republish findings of a paper that has been retracted for fraud or a simple error?

The Council has separate guidelines for Errata, Retractions, and Expressions of Concern. In addition, there are online [exchanges](#) in which one can ask specific questions regarding how to correct a published paper. Both journals and open access publishing entities will have specific guidelines for making these corrections. For example, *Nature* bases its decision-making on four guidelines:

- Consideration of reader interest
- Novelty of arguments
- Integrity of the publication record
- Fairness to the parties involved

The process of responding to an error in a published paper is complicated and burdensome to all involved. However, journal editors are responsible for maintaining the integrity of their publication and upholding strict standards for good science. In the end, it is science and all of its practitioners that lose when mistakes in published papers are allowed to remain uncorrected or, in the case of fraud, unretracted.

Do the Right Thing

Authors have two choices when faced with the revelation of an error in their published papers: attempt to avoid the consequences or make public corrections. Retraction policies and methods of correcting errors or creating an addendum to a research paper will vary by journal. When the author's reputation and the reputation of the journal are at stake, it is best to deal with the error directly and quickly.

In my opinion, there's no reason other than one's ego to not correct something. The longer you let it go, the worse the problem gets.

Jeffery Kelly, Scripps Research Institute

An [article](#) by Kerry Grens describes a momentous occasion in the life of researcher Pamela Ronald – during a talk at a conference, she admitted that her research was flawed, rendering the results invalid. It was a brave moment for her. The audience was horrified as each one realized that, at some point, he or she could be facing the same unhappy facts. Following the announcement, Ronald retracted both papers that were based on the flawed research.

After the shock of her announcement wore off, Ronald was praised for her actions and candidness. Although some viewed this very public confession as an exceptional move, Pamela Ronald did not see another option: “On the one hand I was really very flattered I got that reaction from people, but [I was] also a little bit puzzled,” Ronald says. “I never thought there was a choice.”

Indeed, to maintain one's integrity and reputation as a scientific researcher, the best tip for authors is always honesty. In the fiercely competitive world of academic research, the temptation to rush one's results, to skip important steps in research protocol, or to fabricate or plagiarize findings will always be there. The result of such actions is never good – it neither forwards the cause of science nor enhances the career of the researcher.

SOCIAL MEDIA LANGUAGE

#TipsforAuthors #CorrectingPublishedErrors

#TipsforAuthors who are #CorrectingPublishedErrors