Ethical and Legal Considerations Quiz  
by Laura King, MA, ELS

**Directions:** Select the best answer for the multiple-choice questions below based on your understanding of Chapter 5 of the *AMA Manual of Style*.

1. To meet the criteria for authorship, authors must have made substantial contributions to the work in which of the following areas?

   a. conception and design, or acquisition of data, or analysis and interpretation of data  
   b. drafting the manuscript or revising it critically for important intellectual content  
   c. approval of the version of the manuscript to be published  
   d. all of the above

**Editor's Note:** To justify authorship, an author must meet each of these 3 criteria. However, in this regard the term substantial contribution has not been adequately defined. As a result, the first criterion, “conception and design, or acquisition of data, or analysis and interpretation of the data,” may be interpreted broadly. For example, an author of a nonresearch paper may not have analyzed data per se but may have analyzed literature, events, theories, arguments, or opinions. Therefore, according to the *AMA Manual of Style*, substantial contribution constitutes an important intellectual contribution, without which the work, or an important part of the work, could not have been completed or the manuscript could not have been written and submitted for publication (**§5.1.1, Authorship: Definition, Criteria, Contributions, and Requirements**, p 128 in print).
2. If an author dies or becomes incapacitated before the manuscript is published, his/her name

   a. should be removed from the byline
   b. can appear in the byline and no authorship form is required
   c. should be moved to the Acknowledgments and no authorship form is required
   d. can appear in the byline if a family member or an individual with power of attorney signs the authorship form or copyright transfer/publication license

   Editor's Note: In the case of death or incapacitation of an author during the manuscript submission and review or publication process, a family member or an individual with power of attorney can sign a journal's authorship or publication form for the deceased or incapacitated author, including the transfer of copyright or publication license, on behalf of the deceased or incapacitated author. In this event, the corresponding author can provide information on the deceased or incapacitated author's contributions (§ 5.1.1, Authorship: Definition, Criteria, Contributions, and Requirements, p 131 in print).

3. Any person (other than journal staff members) who has performed extensive editing on the manuscript before submission should

   a. have his/her name listed in the byline
   b. have his/her name listed in the Acknowledgment
   c. have his/her name listed in the byline with a footnote signifying this individual as the editor of the manuscript
   d. not be credited

   Editor's Note: To give proper credit to those who have provided writing or editorial assistance to authors, journal editors should require authors to identify all persons who have participated substantially in the writing or editing of the manuscript. This should include the persons’ names, academic degrees, affiliations, contributions, and indication of whether compensation was received for these contributions. Substantial editing or writing assistance should be disclosed to the editor at the time of manuscript submission and mentioned in the Acknowledgment. Note that journal staff who are listed on the journal’s masthead who edit manuscripts do not need to be credited on specific articles (§ 5.1.2, Guest and Ghost Authors, p 132 in print).
4. In a manuscript written by a group, where should the names of the group members who do not qualify for authorship be listed?

a. all members of the group should be listed in the byline regardless of qualification for authorship
b. those members of the group who do not qualify for authorship should be listed in the byline with a footnote explaining that they are group members who did not meet the qualification for authorship

c. those members of the group who do not qualify for authorship should be listed in the Acknowledgment or in a clearly identified position within the article

d. those members of the group who do not qualify for authorship should not be listed anywhere in the article

*Editor's Note: Those members of the group who do not qualify for authorship would not be listed in the byline but may be listed in the Acknowledgment at the end of the article or in a clearly identified position within the article, such as a box set off by rules (§5.1.7, Group and Collaborative Authorship, pp 135-137 in print).*

5. Which of the following is considered duplicate submission of previously published content?

a. poster previously presented at a meeting
b. abstract previously presented at a meeting
c. abstract previously published in a meeting program proceedings
d. complete manuscript previously published in a meeting program book/proceedings but only available to meeting participants

*Editor's Note: Following the recommendations of the International Committee of Medical Journal Editors (ICMJE), a policy that prohibits or discourages duplicate publication does not preclude consideration of manuscripts that have been presented orally or in abstract or poster form at a professional meeting. However, publication of complete manuscripts in proceedings of such meetings in print or online may preclude consideration for publication in a primary-source journal (§5.3, Duplicate Publication, pp 148-149 in print).*
6. Which of the following are grounds for a charge of scientific misconduct?

a. fabrication or falsification of data
b. plagiarism
c. manipulation of figures that alter the original data
d. all of the above

*Editor’s Note:* Research misconduct is defined as fabrication, falsification, or plagiarism in proposing, performing, or reviewing research or in reporting research results (§5.4, Scientific Misconduct, p 155 in print). In addition, although some enhancements to figures, such as cropping or adjusting color of the entire image, may be appropriate if such manipulations do not alter the interpretation of the original data or omit or obscure important data, any manipulation that results in a change in how the original data will be interpreted or that selectively reports, omits, or obscures important data (such as adding or altering a data element or adjusting tone or compression of an image to make it appear as a uniquely different image) is considered scientific misconduct (§5.4.3, Inappropriate Manipulation of Digital Images, pp 158-159 in print).

7. Authors are required to report detailed information regarding all financial and material support for which of the following?

a. grant support and funding sources
b. provision of equipment
c. provision of supplies
d. all of the above

*Editor’s Note:* In addition to individual financial conflicts of interest, authors should report all financial and material support for the work reported in the manuscript. This includes, but is not limited to, grant support and funding, provision of equipment and supplies, and other paid contributions. All financial and material support should be indicated in the Acknowledgment section of the manuscript, along with detailed information on the roles of each funding source or sponsor (§5.5.2, Reporting Funding and Other Support, p 173 in print).
8. Which of the following does not require permission from the original source to reproduce it or include it in another publication?

a. oral communication
b. written communication
c. abstracts
d. work funded completely by the US government

**Editor's Note:** Authors should obtain written permission from the sources of quotations that are cited as oral and written communications in their manuscripts and should provide a copy of all such permissions to the journal. Works in the public domain (which are not protected by copyright) may be quoted from freely, with proper credit given to the original source. Examples of works in the public domain include those funded completely by the US government and those works on which the copyright term has expired. One widely debated application of fair use is the reproduction of abstracts of journal articles in other publications or databases. It can be argued that abstracts, especially structured abstracts, represent the whole work. As a result, any secondary publication or commercial use of abstracts of journal articles as derivative works in print or online without permission of the copyright owner may be considered copyright infringement (§5.6.7, Copying, Reproducing, Adapting, and Other Uses of Content, pp 197-200 in print). Note that works created by authors of other national governments may be subject to the copyright laws of their respective countries (§5.6.5, Copyright Assignment of License, pp 193-197 in print).

9. Strict confidentiality regarding submitted manuscripts must be maintained between the editor and author except in which of the following circumstances?

a. when a prospective author is invited to write an editorial commenting on the submitted paper
b. when the editor or author considers it necessary to consult a governmental agency representative regarding a serious adverse drug event discussed in the paper
c. when an editor is investigating an allegation of alleged scientific misconduct against the author and needs to consult an institutional or funding authority
d. all of the above

**Editor's Note:** To maintain confidentiality, editors should deny requests or demands for confidential information during editorial evaluation, during peer review, and after publication from any third party, including readers, authors of other manuscripts, owners of the journal, publishing staff other than those
essential to producing the journal in print/online, news media, advertisers, governmental agencies, academic institutions, commercial entities, and representatives of those seeking information for use in actual or threatened legal proceedings. Exceptions to this policy may be made in specific circumstances provided that disclosures are limited and that anyone else given access to confidential information agrees to keep the information confidential. Examples of exceptions include the following: (1) a prospective author who is invited by an editor to write an editorial commenting on a paper that has not yet been published; (2) a governmental agency representative consulted by the editor or author on a matter considered a public health emergency or a matter that by regulation requires notification (eg, serious adverse drug event); and (3) an institutional or funding authority requested by the editor to investigate an allegation of scientific misconduct related to a manuscript under consideration or a published article (§5.7.1, Confidentiality During Editorial Evaluation and Peer Review and After Publication, pp 218-222 in print).

10. Which of the following does not require signed informed consent forms before publication?

a. report describing samples from deceased individuals
b. report describing samples collected for diagnostic purposes only
c. report describing samples or data available from commercial or public repositories or registries
d. all of the above

Editor's Note: The National Institutes of Health considers the following to be components of research not involving human participants: samples from deceased individuals; samples collected for diagnostic purposes only; samples or data that are available from commercial or public repositories or registries; established cell lines that are publicly available; and self-sustaining, cell-free derivative preparations (eg, viral isolates, cloned DNA or RNA). However, if descriptions of the patients who provided these samples make the patients identifiable, their permission is needed (§5.8.1, Ethical Review of Studies and Informed Consent, pp 226-229 in print).
11. Which of the following is not an appropriate means of masking the identify of patients described in research articles?

a. deletion of patients' names, initials, and assigned numbers from case reports  
b. placing black bars over the eyes of patients in photographs  
c. removal of identifying information from radiographs, digital images, and laboratory slides  
d. deletion of identifying details from descriptions of patients in the Results section of the article  
e. all of the above

Editor's Note: Historically, medical journals have taken steps to protect patients' rights to privacy and anonymity, including the deletion of patients' names, initials, and assigned numbers from case reports; removal of identifying information from radiographs, digital images, and laboratory slides; and the deletion of identifying details from descriptions of patients or study participants in published articles. Until the late 1980s, placing black bars over the eyes of patients in photographs was accepted as a way to protect the identities of patients. However, journals began to discontinue this practice when it became apparent that bars across eyes do not protect identities. Photographs with bars placed over the eyes of patients should not be used in publication (§5.8.2, Patients' Rights to Privacy and Anonymity, pp 229-231 in print).

12. Which of the following is an acceptable practice for selling and publishing advertisements in scholarly biomedical journals?

a. interspersing advertisements among popular editorial features but maintaining an advertisement-free editorial section for original research and other major articles  
b. placing advertisements adjacent to articles on the same or closely related topics  
c. publishing advertisements with formats similar to the editorial content of the journal  
d. informing advertisers of editorial content in advance of publication

Editor's Note: Although in scholarly biomedical journals advertisements should not be interleaved within a scientific or clinical article, it is acceptable to group or stack advertisements in the front and back of the journals, leaving an editorial "well" in the middle of the publication for major articles that are not interspersed with ads or to place popular editorial features in the front and back of the journal to allow for ad interspersion in these sections only. Placing advertisements adjacent to related editorial content, publishing advertorials, and providing
advertisers with specific content scheduled for upcoming publication are practices that diminish the credibility of the publication and should be avoided (§5.12.2, Criteria for Advertisements Directed to Physicians and Other Health care Professionals, pp 278-282 in print).