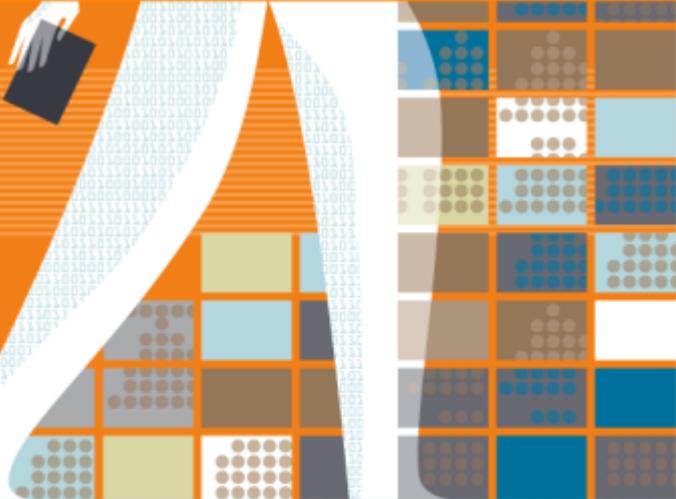




How to be a peer reviewer: a publisher's perspective



Deborah Logan
Publishing Director, Energy & Earth Journals, Elsevier

10 September 2018, PLOTINA Summer School Warwick

Discussion points

- The editorial and peer reviewing process – from submission to outcome and the role of peer review
 - How scholarly journals work in practice
 - Defining peer review
 - The peer review process
 - Main rules, tips, and advice on how to conduct peer review and what makes a good review
 - Research integrity
- Gender aspects

How scholarly journals work in practice



c.1.8 Million

Peer reviewed articles yearly

c. 28,000

Scholarly peer reviewed journals

c. 5,000+

Core Publishers

Elsevier and Peer Review

- Between **30% and 60% of submissions rejected** by >13,000 Editors each year
- Articles not rejected up front for scope/novelty etc (desk reject) get reviewed: Elsevier Journal Editors work with over **half a million reviewers**
- C. 365,000 articles are accepted annually – ‘typeset’, given a DOI, linked to platforms such as Web of Science/Scopus etc. and archived as part of the Scientific Record
- On Science Direct c. 12.6 million articles are online – downloaded 700 million times by 11 million researchers in 120 countries

What is peer review?

- Peer review places the reviewer, with the author, at the heart of scientific publishing
- Reviewers make the editorial process work by examining and commenting on manuscripts
- Without peer review there is no control in scientific communication
- Reviewers are the backbone of the whole process

Role and tasks of reviewer

- The peer review process is based on trust
- The scientific publishing enterprise depends largely on the quality and integrity of the reviewers
- Reviewers should write reports in a collegial and constructive manner
- Reviewers should treat all manuscripts in the same manner

Identifying and inviting peer reviewers

- **Identifying**

- Depends on type of peer review, journal type
- Editor's networks, database of experts, often authors in journal
- Editorial board members
- Scopus search 'find reviewer' tool
- Author-suggested reviewers in cover letters

- **Inviting**

- Number of reviewers depends on field, journal
- Automatic invitation letter sent through submission system
- Reminders sent through system
- Reviewer recognition, certificates for good reviewers

Editors' view: what makes a good reviewer

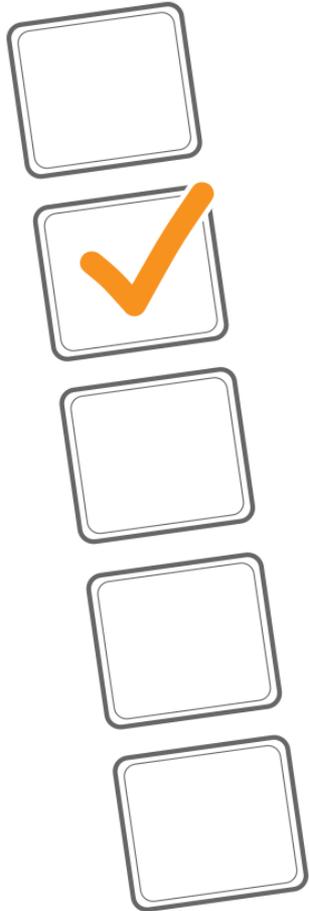
- Provides an objective, thorough, and comprehensive report
- Provides well-founded comments for authors
- Gives constructive criticism
- Provides a clear recommendation to the Editor
- Submits the report on time



Why do reviewers review?

- Value from mentoring young researchers
- Enjoyment in reviewing
- General interest in the area
- Awareness of new research and developments before their peers
- Career development
- Help with own research or new ideas
- Association with journals and Editors
- **Keep updated with latest developments**

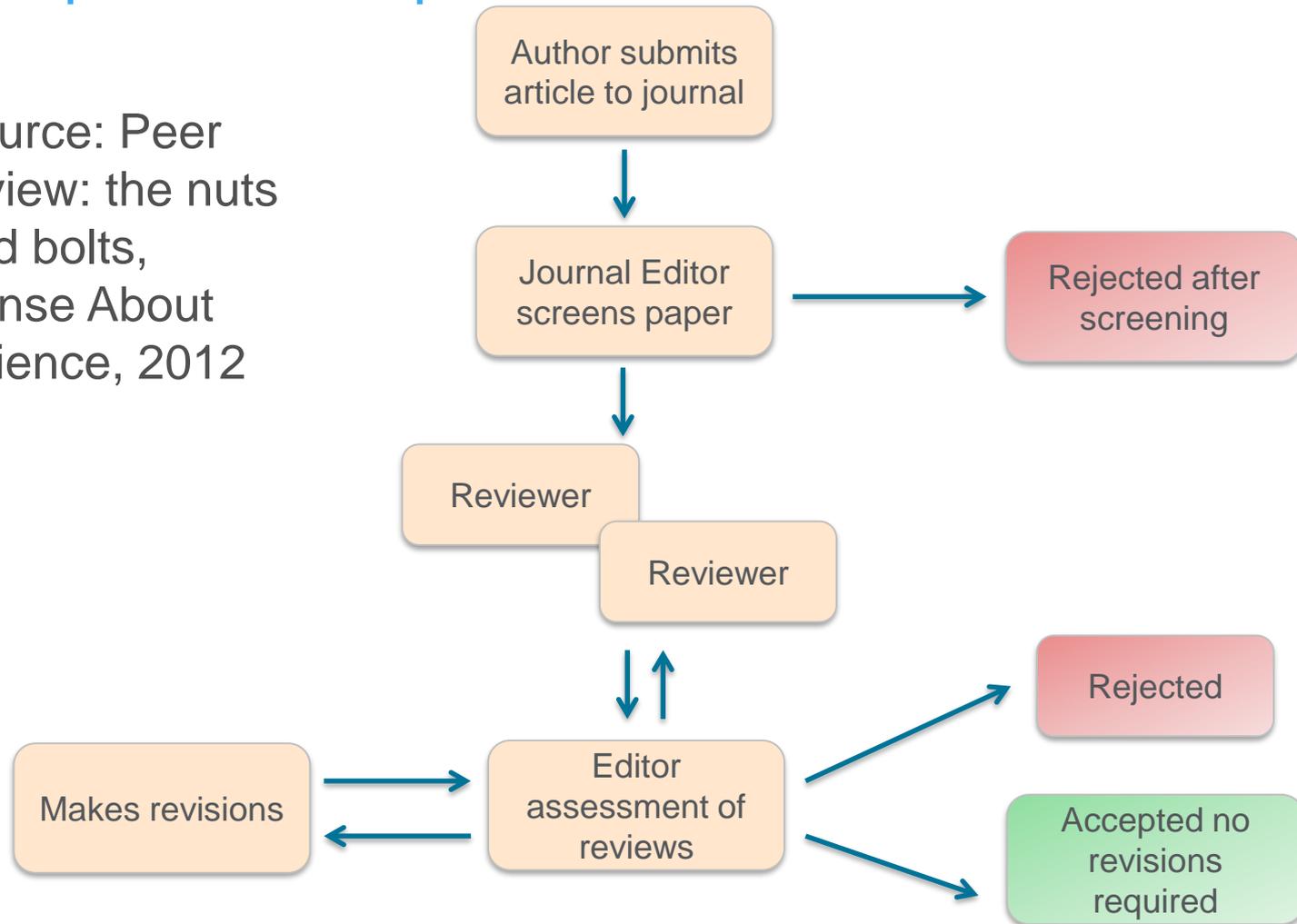
Purpose of peer review



- Improves quality of the published paper
- Ensures previous work is acknowledged
- Determines the importance of findings
- Assesses the originality and significance of the work
- Highlights any omissions in the reference list and any ethics concerns

Typical peer-review process

- Source: Peer review: the nuts and bolts, Sense About Science, 2012



A systematic approach for reviewing

Article section	Description
Writing	Clear and concise English
Title	Specific and reflecting the content of the manuscript
Abstract	Brief and describing the purpose of the work
Methodology	Full explained and relevant to the study
Figures	Justified and clear with fonts proportionate to the size of the figure
Tables	Can they be simplified or condensed? Should any be omitted?
Discussion	Discussion of the findings relating back to the study aims
Conclusion	Implications of the results obtained, and their place in a broader research context; not a summary of findings.
Trade Names/ Abbreviations/Symbols	Properly used where indicated
References	Are all previously published sources properly referenced?

Comments to the editors



- Comment on novelty and significance



- Recommend whether the manuscript is suitable for publication



- Remember that confidential comments will not be disclosed to the author(s)

Comments to the authors

- Provide specific comments on the design
- Comment on the presentation of data, results and discussion
- Ensure comments to the author(s) are consistent with your recommendation to the Editors

“When reviewing, try to remember that you are an author too and be professional and constructive in your approach. That can be hard but don’t let your inner nitpicker get the upper hand. Leave 24 hours between reading the manuscript and writing your review, to allow time for your reasonable self to rise to the fore.”

Stephen Curry, Professor of Structural Biology, Imperial College London

Example of a reviewer checklist for editor's eyes only

- **Reviewer's recommendation** Accept / Minor Revision / Major Revision / Reject
 - **Overall manuscript rating** 1 → 100 (poor → perfect)
-
1. **Is the subject matter suitable for publication in JCR?** Y/N
 2. **Is the paper acceptable in its present form?** Y/N
 3. **Is the paper better suited for another journal?** Y/N
 - a. *If "Yes", which other journal?*
 4. **Does it contain material that might well be omitted?** Y/N
 5. **Does it give adequate references to related work?** Y/N
 6. **Is the English satisfactory?** Y/N
 7. **Is the presentation of the work well organized?** Y/N
 8. **Rate the paper using the following scale**
(4 = Very good, 3 = Good, 2 = Marginal, 1 = Poor)
 - a. **Originality** 1 2 3 4
 - b. **Scientific quality** 1 2 3 4
 - c. **Significance of findings** 1 2 3 4

Confidential document

- Manuscripts are confidential documents where the data is and remains exclusive property of the author(s)
- Must be destroyed after the final decision from the Editor
- Shared responsibility for the review of the manuscript with a colleague must be disclosed to the Editors

CONFIDENTIAL

Reviewers

- Ensure that you review manuscripts in area of expertise only
- Can complete the review on time
- Avoid any conflicts of interest
- Do not use the data
- Provide an honest and critical assessment
- Analyze the strengths and weaknesses



Rejection without external review

- The Editor-in-Chief evaluates submissions and determines whether they enter into the external review process or are rejected
- English language inadequate
- Prior publication of the data
- Multiple simultaneous submissions of the same data

“When your paper is submitted, we first of all look through it briefly to check the format and length, the clarity of the discussion, research methods and overall fit with the journal. This is a fairly quick process – around two weeks or so. If it passes this 'desk review' procedure, we then send it out for full review to subject experts.”

Robert Blackburn, Editor-in-Chief of the International Small Business Journal (ISBJ)

Review process (I)



Articles are initially reviewed by at least two reviewers

When invited, the reviewer receives the abstract of the manuscript

The Editor generally requests that the article be reviewed within 2-4 weeks

Articles are revised until the reviewers agree, or until the Editor decides that the reviewer concerns have been adequately addressed

The reviewers' reports help the Editors to reach a decision on a submitted paper

Review process (II)

- If report has not been received after 4 weeks, the editorial office contacts the reviewer
- If there is a notable disagreement between the reports of the reviewers, a third reviewer may be consulted
- The anonymity of the reviewers is maintained, unless a reviewer asks the Editor to have their identity made known
-

Review process (III)

- Reviewers must not communicate directly with authors
- All manuscripts and materials must be treated confidentially by Editors and reviewers
- The aim is to have a first decision to the authors by 4-6 weeks (depending on the field) after submission
- Meeting the schedule objectives requires a significant effort by all involved
- Reviewers should treat authors as they themselves would like to be treated

Reviewer comments to the editors



Comment on novelty and significance



Recommend whether the manuscript is suitable for publication



Remember that confidential comments will not be disclosed to the author(s)

Comments to the authors

- Provide specific comments on the design
- Comment on the presentation of data, results and discussion
- Ensure comments to the author(s) are consistent with your recommendation to the Editors

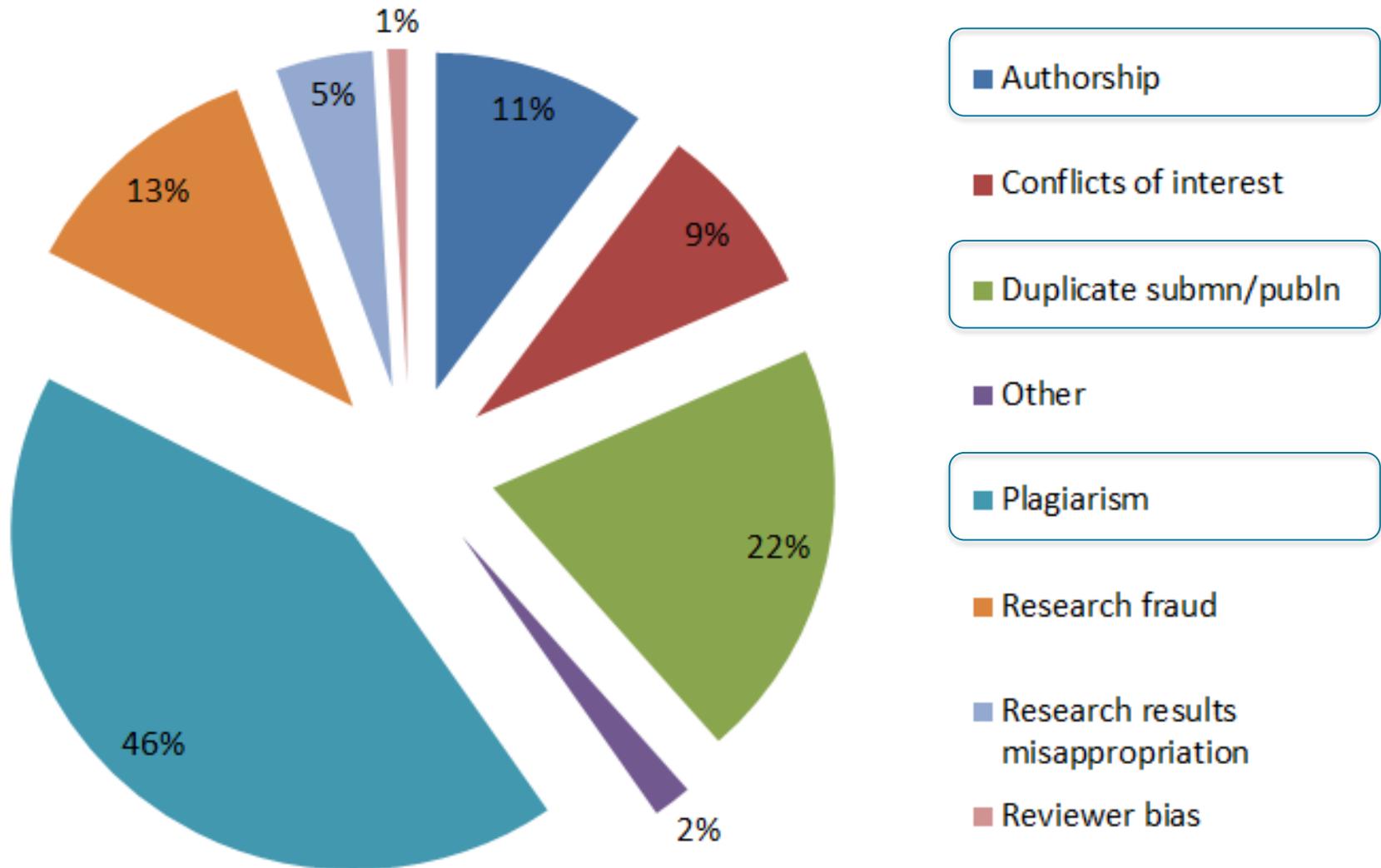
“When reviewing, try to remember that you are an author too and be professional and constructive in your approach. That can be hard but don’t let your inner nit-picker get the upper hand. Leave 24 hours between reading the manuscript and writing your review, to allow time for your reasonable self to rise to the fore.”

Stephen Curry, Professor of Structural Biology, Imperial College London

Confidential document

- Manuscripts are confidential documents where the data is and remains exclusive property of the author(s)
- Must be destroyed after the final decision from the Editor
- Shared responsibility for the review of the manuscript with a colleague must be disclosed to the Editors

Ethics Issues – Plagiarism is the highest amongst



Sample of cases reported to Elsevier Journals publishing staff in 2012

Plagiarism – what is it and how to avoid it

*“Plagiarism is the appropriation of another person’s ideas, processes, results, or words without giving appropriate credit, including those obtained through confidential review of others’ research proposals and manuscripts.”**

Plagiarism is serious but easily avoidable

Correct citation is key

Crediting the work of others (including your advisor’s or your own previous work) by citation is important for at least three reasons:

- To place your own work in context
- To acknowledge the findings of others on which you have built your research
- To maintain the credibility and accuracy of the scientific literature

How big is the problem of plagiarism?

- Huge database of 30+ million articles, from 50,000+ journals, from 400+ publishers
- Software alerts Editors to any similarities between the article and this huge database of published articles
- Many Elsevier journals now check every submitted article using CrossCheck



Can you plagiarise your own work? Text re-cycling/self-plagiarism

A grey area, but best to err on the side of caution: always cite/quote even your own previous work

For example

You publish a paper and in a later paper, copy your Introduction word-for word and perhaps a figure or two without citing the first paper.....

Editors may conclude that you intentionally exaggerated your output

Gender initiative at Elsevier

Elsevier is committed to ensuring that publishing is fair and equitable for all. These are some examples of actions we are taking on the role that gender plays.

- Improving our publishing processes and policies so that authors feel confident our journals publish research without bias or prejudice
- **Reviewing and addressing appropriately the gender diversity of editors, editorial boards, and reviewers to ensure journals continue to be relevant, representative, and stimulating to the communities they serve**
- Reviewing and addressing the gender diversity of speakers and presenters at Elsevier conferences
- Producing analytics and studies on gender in research and in science, technical, and medical publishing

Gender balance on Solar Energy

Data and comparisons:

Elsevier Energy Journals – 2017:

Female editors (Level 1 and 2
i.e. EiC or Paper handling
editors): **13%**

Solar Energy:

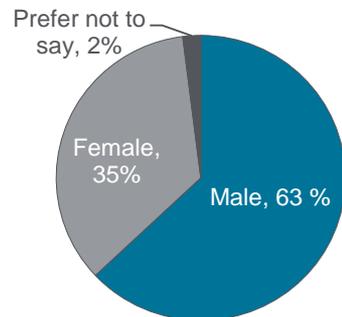
Female Editors: **c. 7%**

***Clearly need to increase this
percentage substantially***

Suggested steps to take:

- Consider diversity when reviewing new editorial appointments
- Consider creating a shortlist of women to be considered for the board
- Show gender more clearly on the journal home pages by including given names and photos
- Always use a diverse reviewer pool
- Slow down decision making
- Reflect on decision making

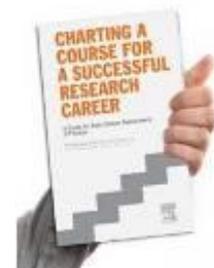
Gender data of
authors in Scopus



Further reading at researcheracademy.com
elsevier.com/authors
elsevier.com/reviewers
elsevier.com/editors



- Understanding the Publishing Process with Elsevier – complete guide
- Publishing Ethics brochure – top reasons to publish ethically
- Get Published – top tips on writing, reviewing and grant writing etc.
- Get Noticed – new ways to promote your article and research
- Open access – definitions and options
- Career Planning Guide – download in 12 languages



Diversity in peer review webinar 13 September

- A free webinar on “Diversity in Peer Review” on 13th of September at 13.00 UTC (2pm UK time). Dr Shirin Heidari from Global Health Centre and the founding chair of the gender policy committee at the European Association of Science Editors will present how peer review can promote equitable gender representation in academia. Sanjana Balu, from Sense About Science, will discuss the role of ECRs in peer review.
- We invite you to [register](#) and attend the webinar and spread the word to your network. Please use #PeerReviewWeek18 and #PeerRevDiversityInclusion
- Webinar link - <https://researcheracademy.elsevier.com/navigating-peer-review/fundamentals-peer-review/diversity-peer-review>

“... it’s not just altruistic to review. **Reviewing continues to improve my own writing and critical thinking**, and it doesn’t hurt to have editors know who you are. It’s a great way of starting a conversation on topics of mutual interest at a conference, and to build ones’ professional network.”

Chris Mebane, USGS



ELSEVIER

Thank you

Connect with me
d.logan@elsevier.com

