Peer review is not as old as you might think ...

“Peer review is often thought of as ancient and unchanging, but it is neither – and it shouldn’t be treated as a sacred cow.”

https://www.timeshighereducation.com/features/peer-review-not-old-you-might-think

Aileen Fyfe
University of St Andrews
Where is the evidence for peer review?

“Our reverence for peer review still often borders on mysticism.”

http://www.nature.com/news/let-s-make-peer-review-scientific-1.20194

Drummond Rennie
JAMA
Surveys show value in peer review

“98% of respondents consider peer review important (31.2%) or extremely important (66.8%) for ensuring quality and integrity of literature.”

Andrew Preston
Publons co-founder

https://publons.com/community/gspr
Active research into peer review

Peer Review Congress (1989 onwards)

Pioneering trials on peer review (1990s BMJ)

Action across communities (e.g. AGU, ASAPbio)

Journals dedicated to peer review (Research Integrity & Peer Review)

Collaborative initiatives researching peer review e.g. PEERE
“Researchers think more training and recognition will improve efficacy of peer review, and that universities need to be doing more to acknowledge peer review.”

Daniel Johnston, Publons co-founder

Transparency in peer review?

Brings benefits and challenges
Community driven?
c. 3% of journals
How to facilitate and scale?

Letter http://asapbio.org/letter

We, the undersigned journals, recognise the benefits of transparency in the peer review process. Therefore, we enable or undertake to enable the publication of all of the content of peer review, but not necessarily the names of reviewers (this is also called open peer review reports) and author responses alongside final, published articles.

We recognize that implementations of published peer review reports may vary—with some journals mandating it for all published articles, while others may offer authors an opt-in or opt-out option—providing an opportunity to compare experiments across different journal policies and fields. In the pursuit of best practices, we commit to sharing information about community responses to varied implementations.

We encourage other journals to join us in this initiative. We hope that our action inspires the community, including researchers, research funders, and research institutions, to recognize the benefits of published peer review reports for all parts of the research system.
Peer review week:

2015: Celebration of peer review
2016: Recognition
2017: Transparency
2018: Diversity

Recognise
- Publons
- ORCID
- DOIs
- CME credits
- Thank yous

Support
- Training & mentoring
- Toolkits
- Policies & guidelines

Technology
- Portable
- Decoupled
- Artificial intelligence
- Automated checks

Initiatives
- Models
- Registered Reports
- Peerage of Science
What’s next for peer review

“Peer review matters, to debate the diverse efforts to support and improve it, and, above all to recognise the researchers who dedicate so much time to it.”

https://scholarlykitchen.sspnet.org/2015/09/28/welcome-to-peer-review-week/

Alice Meadows
ORCID
Thank you

Elizabeth Moylan
@latwec