

The Importance of Peer Review

As Biology Open (BiO) completes its first full year of publication, I would like to take this opportunity to thank all of our reviewers for their hard work (a full list of our reviewers can be found below). All these people have given us their valuable time for free and BiO could not exist without them; we are very grateful for all their efforts.

Peer review is a precious thing. Without it, Open Access journals such as BiO could end up being little more than ‘vanity’ publishers, publishing more or less any paper because to do so increases profits. Critics of author-pays Open Access are right to point out that such journals exist, but they are wrong to suggest that we will all end up drowning in a quagmire of irrelevant and irreproducible data as a result. Scientists are not fools and any journal that adopted this policy would rapidly lose credibility. For the record, 250 papers were submitted to BiO in 2012; so far, 137 have been accepted and 79 rejected (a rejection rate of ~40%).

Indeed, I would argue that peer review at BiO might actually be more effective than it is at some of the very high-impact factor journals. Our reviewers are asked to focus only on whether the conclusions of a paper are justified by the data presented. I have been amazed at how good our reviewers are at spotting any important deficiencies in a paper and suggesting how these can be addressed – often simply by performing an essential control or by toning down a particular conclusion. It is very rare that we accept a paper at BiO without asking for some changes or additional work to be done, but this is always aimed at ensuring that the conclusions are properly backed up by the data.

Several of our authors have commented on how refreshing it is to be able to write a paper honestly and openly, without having to stretch and/or omit data to ensure that an important and definitive conclusion is reached. As I have discussed before (Raff, 2012), given the extreme pressures on scientists to publish in journals with high impact factors, it is perhaps no surprise to learn that other scientists often find the data published in these journals difficult to reproduce (Begley and Ellis, 2012; Mullard, 2011). Thanks to our reviewers, I am very hopeful that this will be less of a problem for papers published in BiO.

References

- Begley, C. G. and Ellis, L. M. (2012). Drug development: raise standards for preclinical cancer research. *Nature* **483**, 531-533.
Mullard, A. (2011). Reliability of ‘new drug target’ claims called into question. *Nat. Rev. Drug Discov.* **10**, 643-644.
Raff, J. W. (2012). Publishing in the biomedical sciences: if it's broken, fix it! *Biol. Open* **1**, 1055-1057.

Jordan W. Raff, Editor-in-Chief
University of Oxford, South Parks Road, Oxford OX1 3RE, UK
bio.editor@biologists.com

In January 2012, the first issue of BiO was published online. As we mark our first anniversary, we have published 154 articles. None of this would have been possible without the invaluable contribution of the more than 200 peer reviewers.

BiO is demanding of its reviewers in that we ask for reviews to be completed within seven working days. That more than 60% of them do so, with 90% within two weeks, is a testament to their dedication and professionalism.

As Publisher, we recognise the vital nature of the work that they do and acknowledge the fact that peer review is a cornerstone of scientific advancement. In 2011, the UK parliament discussed the issue of rewarding and incentivising reviewers (<http://bit.ly/TWYdbG>). One way to reward reviewers is to publicly thank them by name. We have chosen the first anniversary of our first issue to do just that. We thank them for their hard work and for managing to fit just one more task into their busy schedules.

Rachel Hackett, Managing Editor BiO
The Company of Biologists, 140 Cowley Road, Cambridge CB4 0DL, UK
bio@biologists.com

Reviewers in 2012

Ian Adams, MRC Human Genetics Unit, United Kingdom
 Ahmed Ashour Ahmed, University of Oxford, United Kingdom
 Takahiko Akematsu, York University, Toronto, Canada
 Enrique Amaya, University of Manchester, United Kingdom
 Kristin Artinger, University of Colorado Denver, USA
 Sophie Astrof, Weill Medical College of Cornell University, USA
 Nafisa Balasinor, National Institute for Research in Reproductive Health, India
 Betsy Bancroft, Southern Utah University, USA
 Andrew Bannister, University of Cambridge, United Kingdom
 Orit Barneah, Ruppin Academic Center, Israel
 Mark Bass, University of Bristol, United Kingdom
 Bernd Baumann, Ulm University, Germany
 Greg Beitel, Northwestern University, USA
 Robert Belshaw, University of Oxford, United Kingdom
 Timothy Bender, University of Virginia, USA
 Regina Bestbier, University of British Columbia, Canada
 Geir Bjørkøy, HiST, Norway
 Jurgen Bolz, University of Jena, Germany
 Ursula Bommhardt, University of Magdeburg, Germany
 Thilo Borchardt, Max Planck Institute for Heart and Lung Research, Germany
 Gerhard Braus, Georg-August-University Gottingen, Germany
 W. Ted Brown, New York State Institute for Basic Research, USA
 Colin Brown, University of Newcastle, United Kingdom
 Keith Brown, University of Bristol, United Kingdom
 Julia Buck, Oregon State University, USA
 Brian Calvi, Indiana University, USA
 Marina Campione, University of Padova, Italy
 Fernando Casares, University Pablo de Olavide, Spain
 Michael Cheetham, University College London Institute of Ophthalmology, United Kingdom
 Ruth Chiquet-Ehrismann, Friedrich Miescher Institute, Basel, Switzerland
 Jean Cohen, CNRS, France
 Eric Cole, St Olaf College, USA
 Joan Comella, Vall d'Hebron Research Institute, Spain
 David Costantini, University of Glasgow, United Kingdom
 David Crews, University of Texas at Austin, USA
 Giovanni D'Angelo, Telethon Institute of Genetics and Medicine, Italy
 Kim Dale, University of Dundee, United Kingdom
 Jamie Davies, University of Edinburgh, United Kingdom
 Helen Dawe, Exeter University, United Kingdom
 Johan De Rooij, Hubrecht Institute, The Netherlands
 Mauro Degli Esposti, University of Manchester, United Kingdom
 Robert Denver, University of Michigan, USA
 Jacqueline Deschamps, Netherlands Institute for Developmental Biology, The Netherlands
 Eileen Devaney, University of Glasgow, United Kingdom
 Mary Donohoe, Cornell University, USA
 Carlos Dotti, VIB Center for the Biology of Disease, Belgium
 Cynthia Downs, Ben-Gurion University of the Negev, Israel
 Viji Draviam, University of Cambridge, United Kingdom
 Wolfgang Driever, University of Freiburg, Germany
 Kyle Elliott, University of Manitoba, Canada
 Todd Evans, Weill Medical College of Cornell University, USA
 Susan Evans, University of Adelaide, Australia
 Caroline Fabre, University of Oxford, United Kingdom
 Anna Ferrer, Memorial Sloan-Kettering Cancer Center, USA
 Ann Foley, Weill Medical College of Cornell University, USA
 Velia Fowler, The Scripps Research Institute, USA
 Robert Friesel, Maine Medical Center Research Institute, USA
 Fabrizio Gabbiani, Baylor College of Medicine, USA
 Alejandra Garcia-Gasca, CIAD, Mexico
 Arie Gertler, The Hebrew University, Israel

Pietro Ghezzi, Brighton and Sussex Medical School, United Kingdom
 Allen Gibbs, University of Nevada, USA
 Marco Giovannini, House Research Institute, USA
 Jean-Antoine Girault, Institut du Fer, Moulin, INSERM, France
 Mary Goll, Memorial Sloan-Kettering Cancer Center, USA
 Yukiko Gotoh, University of Tokyo, Japan
 Tamar Goulet, University of Mississippi, USA
 Dimitris Grammatopoulos, University of Warwick, United Kingdom
 Paul Greenwood, Colby College, USA
 Chrissy Hammond, University of Bristol, United Kingdom
 Tony Harris, University of Toronto, Canada
 Kevin Harvatine, Penn State University, USA
 Shigetsugu Hatakeyama, Hokkaido University Graduate School of Medicine, Japan
 Dana Hawley, Virginia Polytechnic Institute, USA
 Bernd Heinrich, University of Vermont, USA
 Jan Hemmi, University of Western Australia, Australia
 Clarissa Henry, University of Maine, USA
 Thomas Holstein, Heidelberg University, Germany
 Marko Horb, Marine Biological Laboratory, USA
 Douglas Houston, University of Iowa, USA
 Alan Howe, University of Vermont, USA
 Danwei Huangfu, Memorial Sloan-Kettering Cancer Center, USA
 Masahito Ikawa, Osaka University, Japan
 Javier Irazoqui, Massachusetts General Hospital-Harvard Medical School, USA
 Antonio Jacinto, University of Lisbon, Portugal
 Dagan Jenkins, University College London, United Kingdom
 Anton Jetten, NIEHS, NIH, USA
 Tian Jin, NIAID, NIH, USA
 Wang Jiqiu, Ruijin Hospital, China
 Zhu Jun, University of Wyoming, USA
 Philipp Kahle, Hertie Institute for Clinical Brain Research, Germany
 Chrysi Kanellopoulou, NIH, USA
 Anna Kashina, University of Pennsylvania, USA
 Nancy Kedersha, Brigham and Women's Hospital-Harvard Medical School, USA
 Vladimir Kostal, Biology Centre of the Academy of Sciences of the Czech Republic, Czech Republic
 Justin Kumar, Indiana University, USA
 Tilo Kunath, MRC Centre for Regenerative Medicine, United Kingdom
 Alexander Kurze, University of Oxford, United Kingdom
 Pavithra Lakshminarasimhan, University of Cambridge, United Kingdom
 Tommy Lam, University of Oxford, United Kingdom
 Irina Larina, Baylor College of Medicine, USA
 Roberto Latini, Mario Negri Institute for Pharmacological Research, Italy
 Rudolf Leube, RWTH Aachen University, Germany
 Brian Lewis, NCI-CCR, NIH, USA
 Lawrence Loeb, University of Washington, USA
 Hernan Lopez-Schier, Helmholtz Zentrum Munchen, Germany
 Martin Lowe, University of Manchester, United Kingdom
 Yuchun Luo, University of Colorado Denver, USA
 Giuseppe Lupo, University of Rome La Sapienza, Italy
 Samantha Lycett, University of Edinburgh, United Kingdom
 Laura Machesky, CRUK Beatson Institute for Cancer Research, United Kingdom
 Jesse Mager, University of Massachusetts, USA
 William Mair, Harvard School of Public Health, USA
 Arindam Majumdar, Karolinska Institute, Sweden
 Jean-Bernard Manent, INSERM, France
 Meghan McGee-Lawrence, Mayo Clinic, USA
 Timothy Megraw, Florida State University, USA
 Bjoern Menger, Medical School Hannover, Germany
 Ralph Meyer, University of Pennsylvania, USA
 Domenico Migliorini, University of Geneva, Switzerland
 Takashi Mikawa, University of California San Francisco, USA

Marco Milan, IRB Barcelona, Spain
 Dana Miller, University of Washington, USA
 Justin Molloy, MRC-NIMR, United Kingdom
 Ignacio Moore, Virginia Polytechnic Institute, USA
 Andrea Morash, McMaster University, Canada
 Werner Muller, University Medical Center of the Johannes Gutenberg University Mainz, Germany
 MonnMonn Myat, Weill Medical College of Cornell University, USA
 Kinichi Nakashima, Nara Institute of Science and Technology, Japan
 Jan Nedergaard, Stockholm University, Sweden
 Juergen Neesen, Medical University of Vienna, Austria
 Erich Nigg, University of Basel, Switzerland
 Leo Nijtmans, Nijmegen Center for Mitochondrial Disorders, The Netherlands
 Jeremy Niven, University of Sussex, United Kingdom
 Stefania Nobili, University of Florence, Italy
 Scott Nowak, Kennesaw State University, USA
 Tomasz Nowakowski, University of Edinburgh, United Kingdom
 Sonja Nowotschin, Memorial Sloan-Kettering Cancer Center, USA
 Kathleen O'Connor, University of Kentucky, USA
 Edel O'Toole, Barts and the London School of Medicine and Dentistry, United Kingdom
 Michela Ori, University of Pisa, Italy
 Maddy Parsons, Kings College London, United Kingdom
 Gianandrea Pasquinelli, University of Bologna, Italy
 Andrew Peden, University of Sheffield, USA
 Isabel Peset, University of Cambridge, United Kingdom
 Bjorn Pieper, University of Oxford, United Kingdom
 Raymond Poot, Erasmus MC, The Netherlands
 Edwin Price, University of Wisconsin-Madison, USA
 William Prinz, NIH-NIDDK, USA
 Ian Prior, University of Liverpool, USA
 Autun Purser, Jacobs University, Germany
 Terence Rabbitts, University of Oxford, United Kingdom
 Isaac Rabinovitz, BIDMC-Harvard Medical School, USA
 David Raible, University of Washington, USA
 Vesna Rajkovic, University of Novi Sad, Serbia
 Praveen Raju, Weill Medical College of Cornell University, USA
 Thomas Rando, Stanford University, USA
 Joshua Rappoport, Birmingham University, United Kingdom
 Christina Rathke, Philipps-University Marburg, Germany
 Angel Raya, The Institute for Bioengineering of Catalonia, Spain
 Nicole Rebscher, Marburg University, Germany
 Michael Reed, Tufts University, USA
 Monique Rijnkels, Baylor College of Medicine, USA
 Henry Roehl, University of Sheffield, United Kingdom
 Nela Rosic, The University of Queensland, Australia
 Tatiana Rostovtseva, NICHD, NIH, USA
 Aurelien Roux, University of Geneva, Switzerland
 Aimee Ryan, Research Institute of the McGill University Health Centre, Canada
 Stefan Schulte-Merker, Hubrecht Institute, The Netherlands
 Taiichiro Seki, Nihon University, Japan
 Nenad Sestan, Yale University School of Medicine, USA
 Christopher Shaw, Institute of Psychiatry, United Kingdom
 Guojun Sheng, RIKEN, Japan
 Takashi Shimizu, Hokkaido University, Japan
 Gordon Simpson, University of Dundee, United Kingdom
 Shankar Srinivas, University of Oxford, United Kingdom
 Klaus Steger, University of Giessen, Germany
 Reimer Stick, University of Bremen, Germany
 Brian Storrie, University of Arkansas, USA
 Brian Stramer, Kings College London, United Kingdom
 Xin Sun, University of Wisconsin-Madison, USA
 Atsushi Suzuki, Kyushu University, Japan

David Swanson, University of South Dakota, USA
 Ji Sze, Albert Einstein College of Medicine, USA
 Kazufumi Takamune, Kumamoto University, Japan
 Koji Tamura, Tohoku University, Japan
 John Tattersall, Defence Science and Technology Laboratory, United Kingdom
 Gerhard Technau, University of Mainz, Germany
 David Turner, University of Michigan, USA
 Akiyoshi Uemura, Kobe University Graduate School of Medicine, Japan
 Taro Uyeda, National Institute of Advanced Industrial Science and Technology, Japan
 Teresa Valencak, Veterinary University Vienna, Austria
 Douglas Vernimmen, The Roslin Institute, United Kingdom
 Christoph Viebahn, Göttingen University, Germany
 Christian Voigt, Leibniz Institute for Zoo and Wildlife Research, Germany
 Naoki Watanabe, Tohoku University, Japan
 Roland Wedlich-Soldner, Max-Planck-Institute of Biochemistry, Germany
 Scott Weed, West Virginia University Health Sciences Center, USA
 Brant Weinstein, NICHD, NIH, USA
 Deneen Wellik, University of Michigan Medical Center, USA
 Andreas Winterpacht, University Hospital Erlangen, Germany
 Dieter Wolf, Sanford-Burnham Medical Research Institute, USA
 Robert Wootton, University of Aberystwyth, United Kingdom
 Howard Worman, Columbia University, USA
 Michiaki Yamashita, National Research Institute of Fisheries Science, Japan
 Deborah Yelon, University of California San Diego, USA
 Jeanne Zeh, University of Nevada, USA
 Yong Zhang, Chinese Academy of Sciences, China

Biology Open 2, 1-5

doi: 10.1242/bio.20134093

© 2013. Published by The Company of Biologists Ltd.

This is an Open Access article distributed under the terms of the
 Creative Commons Attribution Non-Commercial Share Alike License
 (<http://creativecommons.org/licenses/by-nc-sa/3.0>)