

Sustainability in Publishing

CHEMISTRY & SUSTAINABILITY

CHEM**SUS****CHEM**

ENERGY & MATERIALS

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WILEY

Impact Factor: A blessing and a curse

- There is more to a journal than IF
- Can be abused
 - By publishers
 - By scientists
 - For administrative purposes
- Can be manipulated

Journal basics: Impact Factor

$$IF = \frac{\textit{Citations in year 3}}{\textit{Papers published in year 1 and year 2}}$$

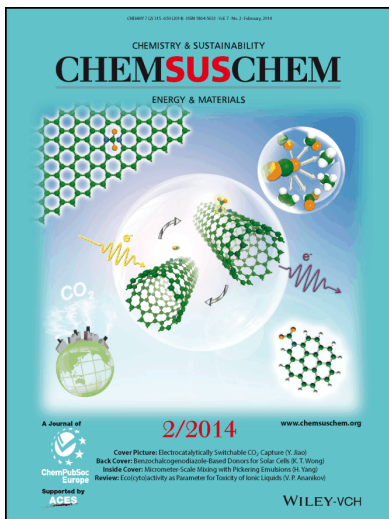
Journal basics: Impact Factor

$$2013: \frac{2676 \text{ (2012 cites)}}{358 \text{ (2010 + 2011 papers)}} = 7.475$$

$$2014: \frac{\text{Citations in 2013}}{\text{Papers published (2011 + 2012)}}$$

Other metric: h -index

- If $h = n$, you have n papers cited n times or more
- Applies to scientists, journals, topics



What we publish

- Communications Short, urgent
- Full Papers Longer, detailed
- (Mini)Reviews Long, overview
- Essays, Highlights Background/topical

Unethical behaviour

- Plagiarism
- Double submission
- Impact Factor gaming
- Not informing all authors
- Data manipulation

- Direct rejection + possible ban!
 See EuChemS ethical guidelines
- Criminal proceedings?!

What can you do? Cover letter

- Be friendly (not essential, but it helps)
- Describe the scientific work
- Explain its relevance
- Connect your results to the hypothesis!
- Suggest potential reviewers
- Optional: oppose certain reviewers

What can you do? Title

- Be descriptive
- Use clear and precise words
- Be critical on redundant words
„Analysis of“ „Novel“ „Highly Efficient“
- Length: 100-150 characters incl. spaces

What can you do? Abstract

- Your „20 second“ pitch
- Should contain all of the words in the title
- Hypothesis!
- Avoid only listing techniques
- Describe results

- 750-1500 characters incl. spaces.

21st century reality

- Initially, more algorithms than humans read your manuscript

but

- If you provide good input, more humans will discover and read your work

Indexing: Title, Abstract, keywords

- How would you search for your work?

Defining a good hypothesis

- Intermediate between what you do in the lab, and the world at large
- WHY will WHAT you do give results?
- Doping A with B enhances its ... properties because ... Because the electronic structures of B and C are similar, we investigated ...

Tips: Introduction

- Give sufficient context
- Describe earlier work by your group AND others
- Build-up for the hypothesis
- Describe what the reader can expect

Tips: Results and Discussion

- Logical build-up
- Watch out for TLAs
(three-letter acronyms)
- Describe what you observed and compare those results to other literature
- Present figures in good quality

Good technical quality: Figures

- One font, one size, one color (Arial or Helvetica)
- Functional over flashy (shadows/gloss/reflection)
- ChemDraw: check for publisher templates

Tips: Conclusion

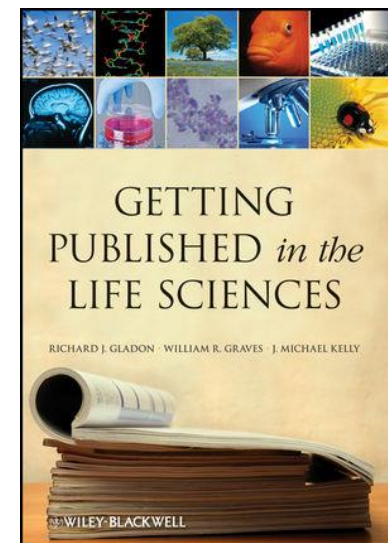
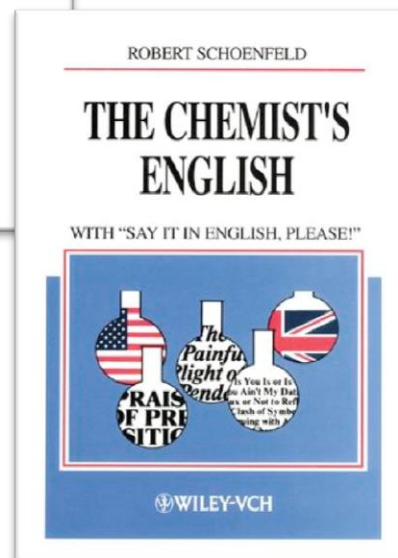
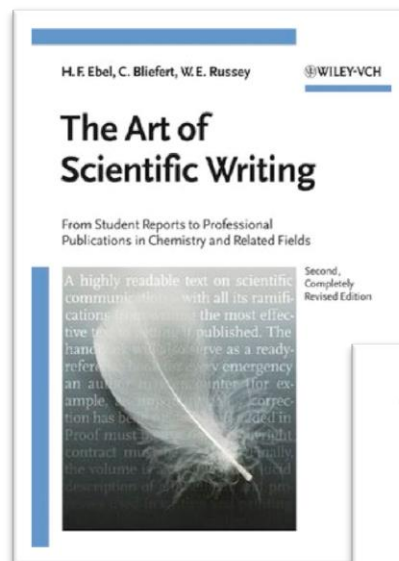
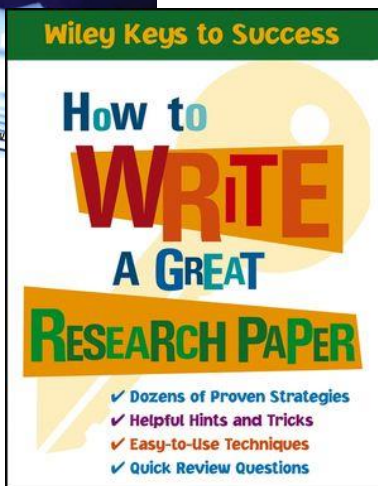
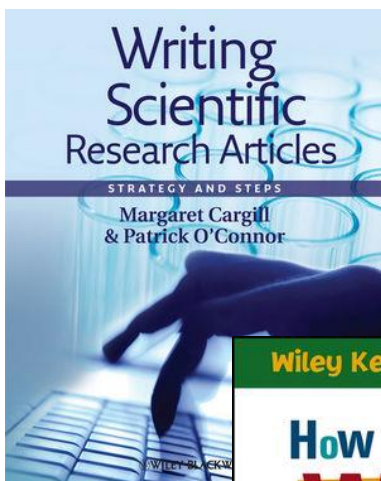
- Reiterate what you set out in the Introduction
- Describe how the results fit, or did not fit, the hypothesis
- Describe how your results advance the field
- Don't exaggerate

Supporting Information

- Consider carefully what is essential
- Mentioning a result does not mean you must show the data plot
-> Supporting Information
- In Supporting Information, be as complete as you can be

“How to write” resources

http://authorservices.wiley.com/bauthor/more_resources.asp



“How to write” resources



Tips for Writing Better Science Papers

by Richard Threlfall
on Chemistry Views

<http://www.chemistryviews.org/>

Webinar:

Coloration Technology: Getting Published

on Chemistry Views

<http://www.chemistryviews.org/>

Essays:

Whitesides' Group: Writing a Paper

G. M. Whitesides

Adv. Mater. **2004**, *16*, 1375

A Brief Guide to Designing Effective Figures for the Scientific Paper

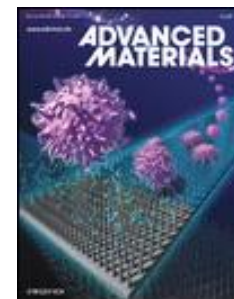
M. Rolandi, K. Cheng, S. Pérez-Kriz

Adv. Mater. **2011**, *23*, 4343

Ten Tips for Authors

B. Johnson

Chem. Asian J. **2011**, *6*, 2859



Bad reports

- This is awful and should never be published
- This group has never published anything decent
- Publish this, but the authors fail to cite my papers; here's a list

Good reports

- Rephrase the research objective
- Are the authors aware of the field?
- Are the techniques appropriate?
- Do the results justify the conclusion?
- Does it fit the journal's scope?
- More suitable for another journal?

Decision time

- Are the reports good?
- Are the reports consistent?
- How much work is required?
(revision vs. rejection)

- If all lights are green: **Accept!**

Editor asks for revision

- Do you already have some data?
- Are the referee comments justified?
- Do not feel attacked: referees are trying to help you

Handling a revision

- Prepare point-by-point response
- Indicate what you have done
- Indicate what you have not done, and why you have not done it

- Response may go back to referees!