How to Prepare A Paper

Main reference:


To publish or not to publish...
Why publish?

• Scientists publish to share with the research community findings that advance knowledge and understanding
  
  • To present new, original results or methods
  
  • To rationalize published results
  
  • To present a review of the field or to summarize a particular topic
Publish or perish

- Funding Bodies
- Scientists / Clinicians
- Journal Publication
- Grant Writing
Editors now regularly analyze citations per article

“The statistic that 27% of our papers were not cited in 5 years was disconcerting. It certainly indicates that **it is important to maintain high standards when accepting papers**... nothing would have been lost except the CV's of those authors would have been shorter…”

– Marv Bauer, Editor, *Remote Sensing of Environment*
Can I publish this?

- Have you done something new and interesting?
- Have you checked the latest results in the field?
- Have the findings been verified?
- Have the appropriate controls been performed?
- Do your findings tell a nice story or is the story incomplete?
- Is the work directly related to a current hot topic?
- Have you provided solutions to any difficult problems?

If all answers are “yes”, then start preparing your manuscript.
Writing a quality manuscript

• Preparations
What type of manuscript?

- Full articles / Original articles
- Letters / Rapid Communications / Short Communications
- Review papers / Perspectives

- Self-evaluate your work: Is it sufficient for a full article? Or are your results so thrilling that they need to be revealed as soon as possible?

- Ask your supervisor and colleagues for advice on manuscript type. Sometimes outsiders may see things more clearly than you.
Who is the audience?

- Do you want to reach specialists, multidisciplinary researchers, or a general audience? You will need to adjust information and writing style accordingly.

- Journals, even in similar subjects, reach readers with different backgrounds.

- Each journal has its own style; read other articles to get an idea of what is accepted.

- Is the readership worldwide or local?
Which journal?

- Consider:
  - Aims and scope (check journal websites and recent articles)
  - Types of articles
  - Readership
  - Current hot topics (go through recent abstracts)
  - Asking colleagues for advice

Sometimes it is necessary to lower one’s sights or return to the lab/clinic to obtain more data.
DO NOT gamble by scattering your manuscript to many journals

Only submit once!

International ethics standards prohibit multiple simultaneous submissions, and editors DO find out!

All editors hate wasting time on poorly prepared manuscripts

It is a sign of disrespect!!
Consult and apply the list of guidelines in the "Guide for Authors"

Ensure that you use the correct:
- Layout
- Section lengths (stick to word limits)
- Nomenclature, abbreviations and spelling (British vs. American)
- Reference format
- Number/type of figures and tables
- Statistics
Writing a quality manuscript

- Article construction
Article structure

- Title
- Authors
- Abstract
- Keywords

Main text (IMRaD)
- Introduction
- Methods
- Results
- Discussion (Conclusion)

- Acknowledgements
- References
- Supplementary material

Need to be accurate and informative for effective indexing and searching

Each has a distinct function
A good title should contain the fewest possible words that adequately describe the contents of a paper.

**DO**
- Convey main findings of research
- Be specific
- Be concise
- Be complete
- Attract readers

**DON’T**
- Use unnecessary jargon
- Use uncommon abbreviations
- Use ambiguous terms
- Use unnecessary detail
- Focus on part of the content only
Slower processing is correlated with higher levels of depressed mood, fatigue, lower verbal fluency, fewer words and digits recalled and poorer recall of visual-spatial information in MS patients.

Relationships between information processing, depression, fatigue and cognition in multiple sclerosis.
Be consistent with spelling, full versus short names, full versus short addresses

Surnames: Pérez-García / Pérez / García
Middle Initial: Use consistently or not at all
First Names: Dave / David
Affiliation: Faculty of Medicine / Faculty of Medical and Health Sciences
Types:

**Indicative (descriptive) abstracts** outline the topics covered in a piece of writing so the reader can decide whether or not to read on. Often used in review articles and conference reports.

**Informative abstracts** summarize the article based on the IMRaD structure, but **without** section headings.

**Structured abstracts** follow headings required by the journal. Often used in Medical journals.

Check carefully which type fits the journal of your choice.
American National Standards Institute: “An well-prepared abstract enables readers to identify the basic content of a document quickly and accurately, to determine its relevance to their interests, and to decide whether they need to read the document in its entirety.

An abstract should provide a brief summary to each of the main sections of the paper.

Most literature indices (e.g., SCI) give abstracts only.

Clear and concise. Economy of words
Do’s & Don’ts in Writing an Abstract

- An abstract should
  - State the principal objectives and scope of the investigation.
  - Describe the methods used.
  - Summarize the results.
  - State the principal conclusions.
  - Always in past tense.

- An abstract should not
  - Give any information or conclusions that are not stated in the paper.
  - Cite references.
  - Contain abbreviations or acronyms.
Abstract for a technical paper
- Single paragraph
- Less than 250 words (rule of thumb)
- Use as little words as possible

Abstract for a report or a thesis
- Extended abstract (a.k.a. executive summary)
- Typically more than a paragraph
- A table or figure is allowed.
The quality of an abstract will strongly influence the editor’s decision.

A good abstract:
- Is precise and honest
- Can stand alone
- Uses no technical jargon
- Is brief and specific
- Cites no references

Use the abstract to “sell” your article.
Keywords

Keywords are important for indexing: they enable your manuscript to be more easily identified and cited

Check the Guide for Authors for journal requirements

• Keywords should be specific
• Avoid uncommon abbreviations and general terms
Failure to replicate the association between NRG1 and schizophrenia using Japanese large sample

Masashi Ikeda\textsuperscript{a,*},\textsuperscript{1}, Nagahide Takahashi\textsuperscript{b,c,1}, Shinichi Saito\textsuperscript{c}, Branko Aleksic\textsuperscript{a,c}, Yuichiro Watanabe\textsuperscript{d}, Ayako Nunokawa\textsuperscript{d}, Yoshio Yamanouchi\textsuperscript{a}, Tsuyoshi Kitajima\textsuperscript{a}, Yoko Kinoshita\textsuperscript{a}, Taro Kishi\textsuperscript{a}, Kunihiro Kawashima\textsuperscript{a}, Ryota Hashimoto\textsuperscript{e,f}, Hiroshi Ujike\textsuperscript{g}, Toshiya Inada\textsuperscript{h}, Toshiyuki Someya\textsuperscript{d}, Masatoshi Takeda\textsuperscript{e,f}, Norio Ozaki\textsuperscript{c}, Nakao Iwata\textsuperscript{a}

Keywords: Schizophrenia; Neuregulin 1; Association study; False positive; Linkage disequilibrium
Provide the necessary background information to put your work into context

It should be clear from the introduction:

- Why the current work was performed
  - aims
  - significance
- What has been done before
- What was done (in brief terms)
- What was achieved (in brief terms)
Introduction

DO

• Consult the Guide for Authors for word limit
• “Set the scene”
• Outline “the problem” and hypotheses
• Ensure that the literature cited is balanced, up to date and relevant
• Define any non-standard abbreviations and jargon
Introduction

DON’T

• Write an extensive review of the field
• Cite disproportionately your own work, work of colleagues or work that supports your findings while ignoring contradictory studies or work by competitors
• Describe methods, results or conclusions other than to outline what was done and achieved in the final paragraph
• Overuse terms like “novel” and “for the first time”
Rotenone is a naturally occurring plant compound derived from the root and bark of some Luguminosae species… Administration of rotenone has been shown to lead to biochemical, anatomical, and behavioral symptoms resembling Parkinson’s disease due to neurotoxicity [1–3]. Previous studies have shown that… However, other studies contradict these findings… Understanding the exact mode of action of rotenone should provide additional useful information toward its possible application in oral cancer treatment. In this report, we…
The Methods section must provide **sufficient information** so that a knowledgeable reader can **reproduce** the experiment.

List suppliers of reagents and manufacturers of equipment, and define apparatus in familiar terms:

- “using an AD 340C **plate reader** (Beckman Coulter)”
- OR
- “using a **plate reader** (Beckman Coulter AD 340C)
- NOT
- “using a Beckman Coulter AD 340C.”

Unless the Guide for Authors states otherwise, use the past tense; the present tense is usually only used in methodology-type papers.
Results

The main findings of the research

**DO**
- Use figures and tables to summarize data
- Show the results of statistical analysis
- Compare “like with like”

**DON’T**
- Duplicate data among tables, figures and text
- Use graphics to illustrate data that can easily be summarized with text
“Readers… often look at the graphics first and many times go no further. Therefore, the reviewer should be particularly sensitive to inclusion of clear and informative graphics.”

– Henry Rapoport, Associate Editor, Journal of Organic Chemistry
Figures and tables are the most effective way to present results

**BUT:**

- Captions should be able to stand alone, such that the figures and tables are understandable without the need to read the entire manuscript
- The data represented should be easy to interpret
- Colour should only be used when necessary
When to Use Tables

- Necessary to present repetitive data.
- A large body of data that cannot be illustrated by a figure.

What’s wrong with the following tables?

<table>
<thead>
<tr>
<th>No. of exp.</th>
<th>Temp. (°C)</th>
<th>pH</th>
<th>Reaction rate (1/s)</th>
</tr>
</thead>
<tbody>
<tr>
<td>3</td>
<td>25</td>
<td>4.5</td>
<td>0.023</td>
</tr>
<tr>
<td>3</td>
<td>25</td>
<td>6.8</td>
<td>0.096</td>
</tr>
</tbody>
</table>

1. First two columns show identical condition.
2. The data can be simply described in the text.
### Temp (°C) vs. Reaction rate (1/s)

<table>
<thead>
<tr>
<th>Temp (°C)</th>
<th>Reaction rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>-10</td>
<td>0</td>
</tr>
<tr>
<td>-5</td>
<td>0</td>
</tr>
<tr>
<td>0</td>
<td>0</td>
</tr>
<tr>
<td>5</td>
<td>0</td>
</tr>
<tr>
<td>10</td>
<td>$1.5332 \times 10^{-4}$</td>
</tr>
<tr>
<td>20</td>
<td>$5.52 \times 10^{-3}$</td>
</tr>
<tr>
<td>40</td>
<td>$1.8 \times 10^{-1}$</td>
</tr>
<tr>
<td>60</td>
<td>0</td>
</tr>
<tr>
<td>80</td>
<td>0</td>
</tr>
</tbody>
</table>

1. Lots of zeros in the table!
2. The reaction is significant only at 40°C.
3. Give only significant figures.
4. Consider using exponent if necessary, but define the exponent.

### Temp (°C) vs. Reaction rate $\times 10^4$ (1/s)

<table>
<thead>
<tr>
<th>Temp (°C)</th>
<th>Reaction rate</th>
</tr>
</thead>
<tbody>
<tr>
<td>10</td>
<td>1.5</td>
</tr>
<tr>
<td>20</td>
<td>55.2</td>
</tr>
<tr>
<td>40</td>
<td>1800.0</td>
</tr>
</tbody>
</table>
How to Design Tables

<table>
<thead>
<tr>
<th>Parameters</th>
<th>Sample 1</th>
<th>Sample 2</th>
<th>Sample 3</th>
</tr>
</thead>
<tbody>
<tr>
<td>Density (g/cm$^3$)</td>
<td>1010</td>
<td>670</td>
<td>880</td>
</tr>
<tr>
<td>Porosity</td>
<td>0.95</td>
<td>0.91</td>
<td>0.93</td>
</tr>
<tr>
<td>Langmuir constant (1/s)</td>
<td>5.16</td>
<td>2.65</td>
<td>1.69</td>
</tr>
<tr>
<td>Half-saturation constant (g/m$^3$)</td>
<td>0.56</td>
<td>0.87</td>
<td>1.10</td>
</tr>
<tr>
<td>Adsorption capacity (g/kg)</td>
<td>23.5</td>
<td>16.8</td>
<td>5.5</td>
</tr>
</tbody>
</table>

A good table! Or is it?
<table>
<thead>
<tr>
<th>Sample no.</th>
<th>Density (g/cm³)</th>
<th>Porosity</th>
<th>Langmuir constant (1/s)</th>
<th>Half-saturation constant (g/m³)</th>
<th>Adsorption capacity (g/kg)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sample 1</td>
<td>1010</td>
<td>0.95</td>
<td>5.16</td>
<td>0.56</td>
<td>23.5</td>
</tr>
<tr>
<td>Sample 2</td>
<td>670</td>
<td>0.91</td>
<td>2.65</td>
<td>0.87</td>
<td>16.8</td>
</tr>
<tr>
<td>Sample 3</td>
<td>880</td>
<td>0.93</td>
<td>1.69</td>
<td>1.10</td>
<td>5.5</td>
</tr>
</tbody>
</table>

1. Table should always read down, not across.
   - Save space and publication cost
   - Easy to compare

2. Words in a column are lined up on left. Numbers are lined up on right (with decimal points).

3. Three main horizontal rules, but no vertical rules.
### Table: Desorption Recovery and mSPE Recovery of PAEs

<table>
<thead>
<tr>
<th>Compound</th>
<th>Desorption Recovery</th>
<th>mSPE Recovery</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>% Recovery (% RSD)</td>
<td>% Recovery vs. desorption of loaded tube (%RSD)</td>
</tr>
<tr>
<td></td>
<td>Without flushing</td>
<td>With flushing</td>
</tr>
<tr>
<td>DEP</td>
<td>97 (5)</td>
<td>48 (8)</td>
</tr>
<tr>
<td>DBP</td>
<td>102 (3)</td>
<td>99 (6)</td>
</tr>
<tr>
<td>BBP</td>
<td>88 (6)</td>
<td>90 (10)</td>
</tr>
<tr>
<td>DEHP</td>
<td>66 (8)</td>
<td>54 (11)</td>
</tr>
<tr>
<td>DOP</td>
<td>47 (7)</td>
<td>31 (10)</td>
</tr>
</tbody>
</table>

**a.** Desorption of five replicates of loaded Tenax TA sorption tubes with each PAE at 200 ng l\(^{-1}\), as compared to five injections of standards with equivalent PAE concentrations.

**b.** Five replicates of Tenax TA sorption tubes prepared with the mSPE using UPW spiked with each PAE at 200 ng l\(^{-1}\). Sampling flow rate was 30 ml min\(^{-1}\).

**c.** UPW flushing at 30 ml min\(^{-1}\) for 5 min.

Illustrations should only be used to present essential data.

The information in the table can be presented in one sentence:

‘The surface soils were dark grayish brown, grading to light olive brown (woodland), light olive brown (wetland), and pale olive (grassland) at 100 cm.’
The figure and table show the same information, but the table is more direct and clear.
Legend is poorly defined
Graph contains too much data
No trend lines
Legend is well defined but there is still too much data and no trendlines.
Graphics

- Legend is clear
- Data is better organized
- Trend lines are present
When to Use Figures

- Use a figure if
  - The data show pronounced trends that are significant to the results.
  - Trends that are not immediately obvious in table.
  - Interesting and representative images.

- Use a table if
  - Data display no obvious trends.
  - Sheer importance of the exact numbers (typical for analytical papers)

- Do not repeat the same data with both tables and figures
Figure 5. Flux decline profile for artificial water samples containing different dissolved silica concentrations (feed flux = 82 m$^3$/m$^2$-day, feed pressure = 500 kPa).

Figure 3. Mass removal profiles for acetone, toluene, and TCE with step-increases in influent acetone loading (dotted stairlines). The mass removal of acetone (●) is indicated by the single arrow corresponding to the left scale, and mass removal of TCE (◇) and toluene (△) are indicated by the single and double arrows corresponding to the right-inner and right-outer scale, respectively.
Fig. 3. The effects of pH on the TOC reduction efficiency (UV exposure time = 60 min; UV intensity = 15.6 mW/cm; initial conc. = 500 mg/L; H$_2$O$_2$ dosage = 0.5%).

**Figure 6.** The effects of storage materials and storage time on phthalate ester leaching.
Fig. 7. The effects of storage materials (filled symbols for PFA; hollow symbols for glass) on the loss of phthalate esters (DEP: ▼; DBP: □; BBP: ◆; DEHP: ○; DOP: △) from solutions as a function of storage time (12 h and 24 h).
Statistics

• Indicate the statistical tests used with all relevant parameters
  
  mean ± SD

• Give numerator and denominators with percentages
  
  40% (100/250)

• Use means and standard deviations to report normally distributed data
• Use medians and interpercentile ranges to report skewed data

• Report $P$ values
  
  $p=0.0035$ rather than $p<0.05$

• The word “significant” should only be used to describe “statistically significant differences”
Discussion

Describe

• How the results relate to the study’s aims and hypotheses
• How the findings relate to those of other studies
• All possible interpretations of your findings
• Limitations of the study

Avoid

• Making “grand statements” that are not supported by the data
  Example: “This novel treatment will massively reduce the prevalence of malaria in the third world”
• Introducing new results or terms
Discussion

In the present study, rotenone treatment caused significant apoptosis in SAS cells, as demonstrated by flow cytometric detection of sub-G_1 DNA content, TUNEL labeling, DNA fragmentation, caspase-3 activation, and PARP cleavage. Shimizu et al. suggested that rotenone and other inhibitors of mitochondrial electron transport do not cause apoptosis, but induce necrotic cell death [11]. However, others have shown that cells treated with rotenone undergo apoptosis [12]. The ability of rotenone to induce apoptosis or necrosis may depend upon the cell type studied, since cellular demise by apoptotic mechanisms occurs readily in many cell types, but in other cells is more difficult to induce [13].
Conclusion

Put your study into **CONTEXT**

Describe how it represents an advance in the field
Suggest future experiments

**BUT**

Avoid repetition with other sections
Avoid being overly speculative
Don’t over-emphasize the impact of your study
In summary, findings from the present study are in general accordance with previous studies that suggest…. There is a need to establish dose-dependent effects of EPA and DHA separately and in different population groups. If findings from this study are applicable to consumption of fish, then intake at the upper level of the current UK guideline range [42] may not influence cardiovascular risk factors in fairly healthy, normolipidemic and middle-aged males.
Acknowledgements

Acknowledge anyone who has helped you with the study, including:

• Researchers who supplied materials or reagents, e.g. vectors or antibodies
• Anyone who helped with the writing or English, or offered critical comments about the content
• Anyone who provided technical help

State why people have been acknowledged and ask their permission

Acknowledge sources of funding, including any grant or reference numbers
Check the style and format as required – it is not the editor’s job to do so for you

Harvard System (alphabetical by author/date):

APA (American Psychological Association) System (alphabetical)

Vancouver System (numbered in order or citation)

There are a number of other systems in use and variations for all systems
How to Cite References

- **Cardinal rules:**
  - Only cite significant and published references. Do not cite references for statements which are widely accepted “knowledge”.
  - Accepted papers are considered published, normally citing the name of the journal followed by “in press.”
  - Check all parts of every reference against the original publication.
  - Check that all references cited in the text are indeed listed in the Literature Cited section, and that all references listed are indeed cited somewhere in the text.
Always identify the correct last names of each author.

Always cite the reference immediately following its application in the text.

“Electrochemical methods have been applied to treat restaurant wastewater, textile wastewater, and municipal wastewater. ¹,²,³”

“Electrochemical methods have been applied to treat restaurant wastewater ¹, textile wastewater², and municipal wastewater ³.”

Be respectful to authors.

“Smith and Jones (1990) failed to observe…..”

“Smith and Jones (1990) ignored …..”

“Smith and Jones (1990) over-simplified…..”

“Smith and Jones (1990) did not account …..”
Journal Abbreviations

- Use abbreviation for journal names, and use the correct ones.
  - Anthropology: Anthropol.
  - Bacteriology: Bacteriol.
  - Microbiology: Microbiol.
  - Technology: Technol.
  - Ecology: Ecol.
  - Environmental Science: Environ.
  - Science: Sci.
  - Engineering: Eng.
  - Pollution: Pollut.
  - Physical: Phys.
  - Chemical: Chem.

- If you are not sure, always find the publisher’s website.
Citation Styles

● Name and Year System (“Harvard” system)
  ● Incorporate author names and publication year in the text.
    “Increasing degree of nitrification in the surface water was observed (Smith and Jones, 1990).”
    “Smith and Jones (1990) observed that increasing degree of nitrification occurred in the surface water.”
  ● If two or more references have the same names and year, then use
    “Smith and Jones (1990a)” and “Smith and Jones (1990b)”
  ● To save space, references with a large number of authors are treated as follows:
    ● Names are always included with either one or two authors.
    ● With three authors, list all three names as the reference is cited for the first time, e.g., “Smith, Jones, and Den, 1990”, but shortened to “Smith et al., 1990”) if it is cited again.
    ● With four or more authors, always use “Smith et al., 1990”.
Reference Cited (no item numbering)

Citation Style

Alphabet-Number System
- Citation by number from an alphabetized list of references.
- Advantages: save space, especially when a long list of references appears at the end of a sentence.

“Increasing degree of nitrification in the surface water has been observed (Smith and Jones, 1990; Chan and Huang, 1997; Clark, 2000; Jordan, Pippen, and Howard, 2002).”

“Increasing degree of nitrification in the surface water has been observed (4, 5, 9, 16).”

“Increasing degree of nitrification in the surface water has been observed. \(^{4,5,9,16}\)”

Disadvantage: The readers cannot associate the name of the person with the cited reference.

- If you think naming the author is important for a particular reference, you can write
  “Smith and Jones (16) observed that........”
- If you think date is important, you can write
  “The occurrence of nitrification in surface water was first observed in 1990 (16).”
Citation Style

- Citation Order System
  - Citing reference (by number) in the order that they appear in the paper.\(^1\)
  - Easy for readers to refer to the references.\(^2\)
  - Trouble for authors if many references are listed because substantial renumbering is needed.\(^3\)

Citing Electronic Sources

- Generally not accepted because webpage is highly “volatile”.
- Citing official information from official website is acceptable.
- Do not cite anonymous article.
Supplementary material

Information related to and supportive of the main text, but of secondary importance

Includes:

• Microarray data
• Sequence data
• Method validation
• Additional controls
• Video data

Will be available online when the manuscript is published
Writing a quality manuscript

Language
“Journal editors, overloaded with quality manuscripts, may make decisions on manuscripts based on formal criteria, like grammar or spelling. Don't get rejected for avoidable mistakes; make sure your manuscript looks perfect”

Arnout Jacobs, Elsevier Publishing

Thus, both the science and the language need to be sound
The three “C”s

• Clarity
• Conciseness
• Correctness (accuracy)

The key is to be as brief and specific as possible without omitting essential details

Know the enemy

• Repetition
• Redundancy
• Ambiguity
• Exaggeration

These are common annoyances for editors
Repetition and redundancy

Don’t copy from other sections verbatim!

In addition, sections were also stained with …

After centrifugation, pellets were then…
In order to examine differences in protein levels, lysates were subjected to 10% SDS-PAGE and Western blotting using an anti-NR1 antibody, to observe the effects of stimulation on receptor trafficking.

The reason for the experiment is described twice, in slightly different terms.
Ensure correct use of “which”, commas and hyphens

“Calcium regulated transcription” has a different meaning from
“Calcium-regulated transcription”

In “To identify biomarkers of prostate cancer, we performed microarray analysis, using custom cDNA arrays” The second comma should be deleted
Ambiguity

Ensure correct use of “which”, commas and hyphens

In “Data were normalised to the internal reference housekeeping gene actin, which showed…”

The “which” is used incorrectly, referring to actin rather than to the normalisation of data

“Data were normalised to the internal reference housekeeping gene actin, revealing that…” is correct
Exaggeration

"There was a massive decrease in the number of tumors following p.o. administration of green tea"

Beware of exaggeration but do indicate significance
Other common traps

Inconsistent tense – don’t mix tenses in the same sentence

Before tumors were microdissected, epithelial cells are…

Inconsistent use of plural or singular

In eight patients, a biopsy from the affected sites of the head and neck was performed

In eight patients, biopsies from the affected sites of the head and neck were performed
Other common traps

Unbalanced sentences – make sure the clauses either side of “compared with” match up

Expression levels of p53 in smokers were compared with non-smokers…

Expression levels of p53 in smokers were compared with those in non-smokers…
Other common traps

Incorrect use of respectively – two corresponding lists are required

The proportions of various monocyte surface markers were 45%, 63% and 70%, respectively

The proportions of monocytes positive for CD163, CD7 and CD11a were 45%, 63% and 70%, respectively
Other common traps

Incorrect use of etc. / and so on

“The two groups of data were compared using a variety of statistical methods including a t-test, chi squared analysis, etc.”

It is important here to define the tests used as they are particular to the paper, not part of a natural series and not obvious to the reader.
Language Editing Services

Your manuscript is precious, invest in it

- Specialist scientific and medical editing services are commercially available to polish the language in your manuscript prior to journal submission
- Rates start from $8 per page

More information can be found on the Elsevier website at:
http://www.elsevier.com/wps/find/authorsview.authors/languagepolishing
Writing a quality manuscript

- Technical details
Layout

• Keep line spacing, font and font size consistent throughout – double-spaced 12-point Times New Roman is preferred

• Use consistent heading styles throughout and no more than three levels of heading

• Number the pages

• Number lines if journal requires – check the Guide for Authors

• Order and title sections as instructed in the Guide for Authors – Figure and Table sections are normally together following References
“...25-30 pages is the ideal length for a submitted manuscript, including ESSENTIAL data only”

Julian Eastoe, Co-editor, *Journal of Colloid and Interface Science*

Consult the Guide for Authors for word and graphic limits

Letters or short communications have stricter limits on the length. For example, 3000 words with no more than five illustrations.
Abbreviations

- Define non-standard abbreviations on first use in both the abstract and the main text
- Check the Guide for Authors for a list of standard abbreviations that don’t need defining
- Don’t abbreviate terms used only once or twice in the entire manuscript – spell these out in full
- Acronyms: capitals not required in the definition unless a proper noun or start of a sentence

ubiquitin proteasome system (UPS)
NOT
Ubiquitin Proteasome System (UPS)
Cover letter

• This is your chance to speak to the editor directly
• Keep it brief, but convey the particular importance of your manuscript to the journal
• Suggest potential reviewers

This is your opportunity to convince the journal editor that they should publish your study, so it is worth investing time at this stage
Include:

- Editor name – Address to journal editor, not generic
- First sentence – provide title, author list and journal name
- Briefly describe:
  - your research area and track record
  - the main findings of your research
  - the significance of your research
- Confirm the originality of the submission
- Confirm that there are no competing financial interests
Revisions and Response to Reviewers
Revision before submission can prevent early rejection

What can I do to ensure my paper is in the best possible state prior to submission?

- Ask colleagues to take a look and be critical
- Check that everything meets the requirements set out in the Guide for Authors – again!
- Check that the scope of the paper is appropriate for the selected journal – change journal rather than submit inappropriately
Final checks

Revision before submission can prevent early rejection

What can I do to ensure my paper is in the best possible state prior to submission?

• If necessary, get a colleague or approved editing service to improve the language and ensure that the manuscript possesses the three “C”s

• Ensure that the literature cited is balanced and that the aims and purpose of the study, and the significance of the results, are clear

• Use a spellchecker
Peer Review Questionnaire

Manuscript Rating Question(s):
Is this topic novel? 1=Yes, 2=No
What level of impact does this paper have? 1=highest, 2=significant, 3=marginal, 4=no impact

Comments to Editor:
Do you agree to your identity being revealed to the author(s)

A  Is this topic novel?
B  Clarity of objectives
C  Quality of methods/correctness of mathematics
D  Quality of data
E  Validity of assumptions and analyses
F  Extent to which the interpretations/conclusions are supported by the data
G  Overall significance of this work
H  Is this paper 1 properly organized?
   2 to the point/concise?
   3 written clearly using correct grammar and syntax?
I Are the approach, results and conclusions intelligible from the abstract alone?
J Is the title informative and a reflection of the content?
K Are the illustrations/tables 1 useful and all necessary?
    2 of good quality?
L Is the referencing relevant, up to date, accessible and complete?
M Are the keywords (if provided) appropriate and complete?
N Overall quality of the work
O Can you suggest any improvements to this work, or any parts which could be shortened or removed
P Is this work acceptable in its present format?
Q What is your final recommendation?
Post-referee revision

Carefully study the reviewers’ comments and prepare a detailed letter of response

- Respond to all points; even if you disagree with a reviewer, provide a polite, scientifically solid rebuttal rather than ignore their comment
- Provide page and line numbers when referring to revisions made in the manuscript
- Perform additional calculations, computations, or experiments if required; these usually serve to make the final paper stronger
The reviewer is clearly ignorant of the work of Bonifaci et al. (2008) showing that the electric field strength in the ionization zone of the burned corona is less than the space charge free field before the corona onset....

Thank you for your comment. However, we feel that the assumption in our model is supported by recent work by Bonifaci et al. (2008), who showed that the electric field strength in the ionization zone of the burned corona is less than the space charge free field before the corona onset.
Post-referee revision

• State specifically what changes you have made to address the reviewers’ comments, mentioning the page and line numbers where changes have been made.

• Avoid repeating the same response over and over; if a similar comment is made by multiple people explain your position once and refer back to your earlier response in responses to other reviewers or the editor.
Reviewer’s Comments: It would also be good to acknowledge that geographic routing as you describe it is not a complete routing solution for wireless networks, except for applications that address a region rather than a particular node. Routing between nodes requires further machinery, which detracts from the benefits of geographic routing, and which I don't believe you have made practical.

Author’s reply: We agree and will add an appropriate caveat. Note that for data-centric storage (name-based exact-match and range queries for sensed events), the storage and query processing mechanisms "natively" address packets geographically – without a "node-to-location" database.

Dr. Ramesh Govindan,
Professor, Computer Science Department, University of Southern California
Ethical Issues

Unethical behavior “can earn rejection and even a ban from publishing in the journal”

Terry M. Phillips, Editor, *Journal of Chromatography B*
Multiple submissions save your time but waste editors’

The editorial process of your manuscripts will be completely stopped if the duplicated submissions are discovered

“\textit{It is considered to be unethical... We have thrown out a paper when an author was caught doing this. I believe that the other journal did the same thing}”

James C. Hower, Editor, \textit{International Journal of Coal Geology}
Multiple submissions

Competing journals constantly exchange information on suspicious papers

You should not send your manuscripts to a second journal **UNTIL** you receive the **final decision from the first journal**

DON’T DO IT!!
An author should not submit for consideration in another journal a previously published paper.

- Published studies do not need to be repeated unless further confirmation is required.
- Previous publication of an abstract during the proceedings of conferences does not preclude subsequent submission for publication, but full disclosure should be made at the time of submission.
• Re-publication of a paper in another language is acceptable, provided that there is full and prominent disclosure of its original source at the time of submission.

• At the time of submission, authors should disclose details of related papers, even if in a different language, and similar papers *in press*. 
“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”

Federal Office of Science and Technology Policy, 1999
“Presenting the data or interpretations of others without crediting them, and thereby gaining for yourself the rewards earned by others, is theft, and it eliminates the motivation of working scientists to generate new data and interpretations”

Bruce Railsback, Professor, Department of Geology, University of Georgia

For more information on plagiarism and self-plagiarism, please see: http://facpub.stjohns.edu/~roigm/plagiarism/
Plagiarism is a serious offence that could lead to paper rejection, academic charges and termination of employment. It will seriously affect your scientific reputation.

DON’T DO IT!

Unacceptable paraphrasing, even with correct citation, is considered plagiarism.
Paraphrasing

• Original (Gratz, 1982):

  Bilateral vagotomy resulted in an increase in tidal volume but a depression in respiratory frequency such that total ventilation did not change.

• Restatement 1:

  Gratz (1982) showed that bilateral vagotomy resulted in an increase in tidal volume but a depression in respiratory frequency such that total ventilation did not change.

Ronald K. Gratz. *Using Other’s Words and Ideas.*
Department of Biological Sciences, Michigan Technological University
Paraphrasing

• **Original (Buchanan, 1996):**
  What makes intentionally killing a human being a moral wrong for which the killer is to be condemned is that the killer did this morally bad thing not inadvertently or even negligently, but with a conscious purpose – with eyes open and a will directed toward that very object.

• **Restatement 2:**
  Buchanan (1996) states that we condemn a person who intentionally kills a human being because he did a "morally bad thing" not through negligence or accident but with open eyes and a direct will to take that life.

Ronald K. Gratz. *Using Other’s Words and Ideas.*
Department of Biological Sciences, Michigan Technological University
Data fabrication and falsification

- Fabrication is making up data or results, and recording or reporting them.
- Falsification is manipulating research materials, equipment, processes; or changing / omitting data or results such that the research is not accurately represented in the research record.

“The most dangerous of all falsehoods is a slightly distorted truth”

G.C. Lichtenberg (1742–1799)
Unethical research

- Experiments on human subjects or animals should follow related ethical standards, namely, the Helsinki Declaration of 1975, as revised in 2000 (5)

- If doubt exists concerning the compliance of the research with the Helsinki Declaration, authors must explain the rationale for their approach and demonstrate approval from the institutional review body
Improper author contribution

Authorship credit should be based on

1. Substantial contributions to conception and design, or acquisition of data, or analysis and interpretation of data

2. Drafting the article or revising it critically for important intellectual content

3. Final approval of the version to be published

Authors should meet conditions 1, 2, and 3. Those who have participated in certain substantive aspects of the research project should be acknowledged or listed as contributors. Check the Guide for Authors and ICMJE guidelines: http://www.icmje.org/
Conclusion: Getting Accepted
What gets you accepted?

- Attention to details
- Check and double check your work
- Consider the reviews
- English must be as good as possible
- Presentation is important
- Take your time with revision
- Acknowledge those who have helped you
- New, original and previously unpublished
- Critically evaluate your own manuscript
- Ethical rules must be obeyed

– Nigel John Cook, Editor-in-Chief, Ore Geology Reviews