SCIENTIFIC WRITING AND PUBLISHING IN JOURNALS

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Summary Slide

WHY?

- **DUTY** to communicate the results of our research so that they could be useful to our colleagues (peers), since publications:-
  - **INCREASE** knowledge
  - **STIMULATE** debate
  - **ENCOURAGE** further work
- Much research is done, but only a **SMALL** amount is published

  >>> originality & the story line!

  >>> What's new? What's different?

HOW?

❖ **CHOICE of JOURNAL**
This will influence the format and style of your paper.

❖ **RELEVANT** questions:-

- ❖ **SCOPE & AIMS** of journal.
  Your paper must conform, otherwise it will be **REJECTED**.

- ❖ **FREQUENCY** of publication.
  A monthly journal is faster than a biannual one.

HOW?

- **TYPES** of articles accepted by the journal, including **LENGTH**.

- **CONDITIONS** for acceptance including membership of society, statistical analysis used, replication of experiments, originality..

- **PAGE CHARGES**. This can be very high especially for some **ONLINE OPEN ACCESS JOURNALS**.

HOW?

- **SPECIAL REQUIREMENTS.** Only some journals will print colour photographs or electron micrographs.

- **REJECTION RATE.** A journal with a higher impact factor (IF) like Nature has a higher rejection rate than one with a lower IF like Biochemical Genetics. Also Nature usually only accepts fundamental blue sky research results.

HOW?

❖ **JOURNAL STYLE. You must strictly conform to your chosen journal's style and format and the language used must be linguistically correct in terms of SPELLING and GRAMMAR.**

❖ **USE your word processor's spell and grammar check functions.**

HOW?

- ## <u>Your Paper</u>

- ## <u>Title</u>: This is the face which will be found in databases and references. It should be concise, accurate, informative. No wasted words, most important phrase first. Description or statement.

- ## <u>Authors</u>

- ## <u>Address</u> (+ email address of ALL authors)

HOW?

- **The <u>Abstract</u> or summary. It is the heart of your paper. This is the portion of your paper that will be most read. Usually about 150-200 words. It should have information on objectives, (methods if novel or interesting), major actual results, significance and implications.**

- **<u>Keywords</u>. These are important for indexing and electronic searches. Ensure that the words are as specific as possible.**

- **Highlights (restricted number of characters)**

- **Cover Page (state your story line)**

HOW?

❖ **PAPER LAYOUT**. **The classic pattern:-**
"IMRAD"

> ❖ **INTRODUCTION: Why and objectives.**
> ❖ **MATERIALS: What did I use & how was it used.**
> ❖ **METHODS: What did I do and how did I do it.**
> ❖ **RESULTS: What happened?**
> ❖ **DISCUSSION: What does it all mean?**

HOW?

❖ **CONCLUSIONS**:

What are the implications?

❖ **ACKNOWLEDGEMENTS**:

Who helped me?

❖ **REFERENCES**:

Who have I cited in the text?

❖ **FIGURES, TABLES,GRAPHS**:

These must all support your text.

ETHICS

- **FRAUD AND PLAGARISM: These are becoming common now with the availability of computer software and internet search facilities.**

- **DOUBLE PUBLICATION: This is when the same body of data is used to produce two papers that are published in two different journals.**

- **MULTIPLE SUBMISSIONS: When you submit the same manuscript to another journal at the same time. This is CHEATING!**

AUTHORSHIP

- **RESPONSIBILITY: All those whose names are listed are responsible for the contents of the paper.. for the better or for the worse.**

- **SUGGESTED GUIDELINES: First author is the one who did most of the work and wrote most of the paper. Second is the one who supervised the activity of the first, planning the study, helping to write the paper. Next would be other workers listed in decreasing order of contributions. However, sometimes the most prominent researcher is listed last.**

AUTHORSHIP

❖ **FORMAT FOR YOUR NAME:**

Please choose your "scientific" name at the start of your career and stick to it..

For example if I use: Mohd Ali Hassan, I could be indexed as M.A. Hassan

or M. Ali Hassan or even A.H. Mohd

CITATIONS AND h INDEX

- **CITATIONS**: Scopus (since 1996)
  or Google Scholar, Web of Science..

- **h INDEX**: Proposed by Hirsch
  = maximum number of your papers cited
  the same number of times