

GUIDES TO UNDERTAKING RESEARCH

6.7 Writing the Introduction Section of a Manuscript

A research manuscript Abstract summarises and advertises the study, its Results section catalogues what the study found, the Methods section details how it was found and the Discussion and Conclusions explain what it all means. The Introduction section connects all these, and provides an entry point for the critical reader looking for details of the study itself. It provides a brief summary of current knowledge notes the important knowledge gaps in the field, gently leading the reader towards the specific questions the manuscript will address. It may also give a few pointers to the research approach used. Here, we introduce some of the important features of a good Introduction section and how to put it all together.

Starting out – writing and thinking

It is important to have at least some significant outcome data and method details to guide the construction of a new manuscript Introduction. It is nevertheless a good idea to draft an Introduction as early as possible since this helps give a concrete shape to the emerging manuscript and practices the arguments and narrative that will be used.

The scope of the manuscript,

When writing the Introduction, it is important to be clear about the scope of the manuscript and how general or focussed its subject. There is little point in writing very much on subjects that the manuscript will not address, as this only distracts and irritates the reader. Thus, for example, introducing a study on an HIV infection prevention strategy will not require an extended general essay about AIDS (unless the audience is somehow unaware of AIDS) but rather a brief summary of the relevant features of HIV infections with an overview of current prevention strategies.

Style

The Introduction provides an opportunity to write in a relaxed and simple way, as it does not have to be as dense as the Abstract nor as dry and detail-focussed as the Results and Methods. Even so, every sentence should justify the space it takes up, should be short and carefully linked to the following

sentence to make the whole text flow well. Most journals have word length limits (which should be checked) and readers have their limits too. A short, clear and informative Introduction that is stimulating and easy to read is the general aim, which will not only encourage the reader to continue through the manuscript but also persuade even difficult editors that the manuscript should be taken seriously. Achieving all this takes time and many revisions with input and added polish from other authors.

Models

If there are other papers close in subject matter it is always useful to see how they have written their Introductions. These should be carefully examined to find features that might be good to emulate without, of course, emulating too closely. Those papers should in any case be read to provide information about the current state of the field. A firm grasp of this is needed when writing to help bring out the novel and important aspects of the manuscript, features that should be made prominent.

Structure: Preambling

The very first part of the Introduction should be a preamble sentence or two that raises the general topic that the manuscript will address. This is needed so that the reader quickly engages with the

subject and can judge its relevance. The necessary brevity of the preamble means it can do little more than state why a disease or condition urgently requires our concern, and what has previously been done to address it. This sets the stage for the next part.

Structure: overview or background of the subject

This part is a mini-review of the subject area, with appropriate references. This outlines what is known of the pathobiology of the condition and its important clinical features. This section forms a substantial part of the Introduction, more than half, and should be useful to any readers interested in the field, not just those interested in this manuscript. Indeed, if there are no narrative reviews on a subject then reading Introduction sections of papers in the field is the next best thing. However, this mini-review should not contain excessive detail beyond that needed to comprehend the study and its outcomes. Hopefully, the reader will emerge better informed, and confident not only that the subject is important but that the authors have a firm grasp of it.

Introduction versus Discussion

Included in the Introduction will be a lot of material on the background of the study. In some cases there is so much interesting material that it may make the Introduction too large. One solution is to move some of the more detailed material to the Discussion section. There is more space in the Discussion and it can help enlighten debate around the study findings. It can often, however, be hard to decide what to put in the Introduction and what in the Discussion.

Whichever is decided, the priority is that the Introduction is short, nicely structured and does not ramble on about peripheral subjects. Some prized text may have to be moved or removed to achieve that, but as always it must be accepted that imperfections are inevitable.

Structure: why was the work done?

Next to include are the important questions that remain in the field, focussing on those questions the study specifically addressed. The research Question

or Questions (decided when the study was originally designed) is usually summarised succinctly in this part; in some cases it may be better to put it/them in the preamble, but this is a matter of author judgement.

Structure: hypotheses.

The research hypotheses may be stated here, unless the manuscript is exploratory rather than hypothesis-driven, in which case the research strategy needs to be outlined.

Structure: why was the work done this way?

There should be a note as to why the particular approaches or methods used were employed rather than some other methods. This can be an opportunity to head off reviewer arguments that some other methodology would be better.

The ending

Lastly, the last few lines of the Introduction should note the intended outcomes of the study. Alternatively, the main *actual* outcomes of the study could be mentioned. Choosing which alternative will depend on the journal intended, which should be consulted to determine its preferences.

Last thought about structure

The above notes detail a typical Introduction structure that can be seen in many papers across disciplines. In practice there is significant flexibility in the order, length and detail of these parts, but all of those components should be included.

