

Research Proposals and Reports

A Brief Overview of Research Proposals and Reports

The goal of psychology is to better understand the mind and behavior. Although there is considerable psychological variation among individuals—so much that no two people are ever completely alike—the scientific methods employed by research psychology allow for the discovery and prediction of stable patterns across human populations. Nevertheless, because any given thought or behavior is typically the product of multiple interacting factors, the claims of research psychology should be viewed as “probabilistic claims” (what’s *most likely to be the case* in the studied demographic). This differs from claims of most other scientific fields, which are often considered absolutes (such as the claim that each water molecule consists of two hydrogen atoms and one oxygen atom).

Writing a psychology research paper is like writing about a mystery waiting to be solved. In a mystery, there is an existing circumstance that leads a detective to devise questions and an overall hypothesis that may address the truth of the situation at hand. This is the same process followed in psychological research. When crafting your report, keep in mind that:

- **The introduction** should address the situation, pre-existing evidence, and questions or hypotheses that pertain to the methods the writer will complete to seek further insight.
- **The methods** section relates to a detective’s testing of those hypotheses, which is essentially gathering additional evidence.
- **The results and discussion section(s)** should provide further information pertaining to the relevance of the hypotheses, and will provide a reference point for further investigation.

The purpose of writing research proposals or a report is to design and analyze behavioral data according to psychology’s methods, and to relay that information as a psychologist would. The trick is to do this without relying on jargon or writing that isn’t clear.

Audience

Your primary audience is your professor and classmates. However, you should write so that anyone in the field of psychology—or even a general academic audience—can understand your research and the purpose of the report.

Writing Process Tips

Read Carefully

Read multiple articles before writing a research proposal or report in order to gain an accurate understanding of that area of research and to create a sensible research question or hypothesis.

Ask yourself, “How many articles have I actually read for this assignment? Am I ready to dive into the writing, or should I read up on this some more?” You would not want to get stuck in a rut and have to backtrack simply because you thought it would save time and energy to read less and write sooner.

Annotate

Consider writing an annotated bibliography for articles read early in the assignment process (before writing the proposal or report). Writing an annotated bibliography essentially consists of taking a few minutes to summarize an article you just read, specifically mentioning aspects that potentially pertain to your research proposal or report. Writing an annotated bibliography can save time and energy when writing a literature review. An annotated bibliography is an effective way to keep track of findings and to learn what further research can be done to develop that research area.

Recycle

Keep in mind that writing a research proposal completes the first few steps of writing a research report. The proposal outlines an introduction that references previous findings and the question that inspired the hypothesis, as well as a methodology for an experiment. These are the first few sections of a complete research report.

However, when actually completing the research, you may experience changes that lead to alternative methods, and it will be necessary to rewrite your methodology section to accurately describe your research process.

Organizing a Proposal or Research Report

A research proposal and research report are similarly organized. A proposal can transform into a report upon completion of the results and discussion sections, but the report needs to portray the actual methods completed if different from the proposal's ideas.

Introduction and Literature Review

This section includes a description of the current issue at hand and references existing research about this issue. The section needs to include a rationale for the research—a discussion of why the topic matters and is worthy of research.

In addition, it includes questions for which you will seek responses throughout your research (whether you just propose the experiment or actually complete it). Questions need to be mirrored in the discussion section, where responses to those questions will be provided.

Finally, you must include a hypothesis—a theory-based prediction that could possibly be disproved by your research. For example, the theory might be that three-year-old children are self-sacrificing. Your prediction might be that three-year-old children will give up their toys when approached by other children. This kind of prediction could lead you to a specific hypothesis related to your chosen research methods.

Methods

The methods section describes how the study is to be conducted. This section is to the point and steps-based.

Results (for Report only)

The results section of a report should include the following information:

- Responses to research questions.
- Statistical analysis.
- Data illustrations.
- Summary of results interpretation.

Discussion (for Report only)

The discussion addresses the questions from the introduction; it provides

Writing an annotated bibliography is a great way to get organized and knowledgeable on your topic.

The Methods Section Includes:

- Sample size, demographic characteristics of subjects, and how they are recruited and assigned to experimental conditions.
- Design—study type, condition descriptions, group assignments, etc.).
- Materials/apparatuses used.
- Procedures—what process was followed.
- Measures—how data is collected/ scored/compared.

responses to those questions based on the experimental findings. The discussion section also:

- Explains the meaning of the data described in the results section.
- Addresses the question “So what is next?” and how the results advance the field of psychology in general.
- Notes any limitations to the research. Was the sample size too small to yield effective results? Was the sample truly random, or did a selective sampling impact the research results?

Research Proposal Summary

There is not a set organization for the summary of a research proposal, but the following elements are generally included:

- A restatement of why the research question is important.
- A description of how the proposed methods are different from ones that have been used before. (What exactly makes the proposed study unique?)
- A description of any potential limitations of the proposed methods, followed by a defense of their use. (Given the limitations, why is this study still worth pursuing?)
- A discussion of the implications of the findings of the proposed study, whatever they may be.

Prompts for Writing Consultations

- Is the thesis clear?
- Does the introduction effectively address the study as a whole, without addressing the results and discussion? Sometimes an introduction includes an actual outline of what’s covered throughout the report—a statement that begins “this report describes....”
- Is it clear that the writer has done enough background reading on the issue?
- Does the literature review address previous research results and show why the research is worth pursuing at this point?
- Is it clear *why* the writer did what he or she did in the study?
- Does the introduction include specific, clearly identifiable questions to be addressed in the research?
- Do the questions in the introduction appear again in the results and discussion sections? The results section should provide data-specific results for those questions, and the discussion section should further analyze the meaning of those results. If the introduction questions are not brought up again, the writer should consider whether they are necessary to include at all, or need to be attended to more in the results and discussion sections.
- The report should be predictable after the introduction in that it should follow the pattern described throughout this guide. Is this the case?
- Are all the elements of the introduction/methods/results/discussion sections complete?
- Is there sufficient evidence provided throughout the report? Does the writer show readers the reasoning/results of the research?
- Are sources cited correctly according to APA style?
- Does this paper follow the professor’s expectations for formatting?

Take Notice of Voice/Tone

The writing should be formal, but not too “jargony.” It should be understandable by psychology experts and non-experts alike.

Format Accurately

- APA standards (citations, manuscript format, titles, headers, etc.) must be adhered to. The Publication Manual of the American Psychological Association is the definitive guide to APA style, but the following website is also helpful: <http://www.dianahacker.com/resdoc>.
- There are specific sections of the report identified by headings, but it is important to remember that the report is a coherent whole, with each section providing useful information that connects to other sections.
- Quotations are expected to support opinions about research findings (both own research results and from pre-existing research) with evidence—the key factor to relaying experimental information.