

## Planning and Writing an Analytical Empirical Paper in Political Science

Prof. Tim Büthe  
Stanford University  
Political Science 116, Non-State Actors in World Politics

*The following 10 points provide some advice for your research paper. This mimeograph is based, with permission, on a handout by Peter Hall for his courses in comparative politics at Harvard College. None of the following advice is set in stone, but I hope it will help you write a convincing paper and organize your research and writing efficiently.*

1. In almost every paper, you are explaining some phenomenon (why something occurred or did not occur in a particular way). At the outset, then, **identify what you are explaining** and why it is puzzling or important. Make sure the reader knows at the beginning what the paper is about and what it explains. You might want to do this by posing a question.

2. Then, consider any special **issues that arise in defining the dependent variable**, that is, what you are explaining. If stating your question involves using any terms that are ambiguous or not commonly understood, define them. In some cases, a phenomenon that looks simple is really complex, i.e. it has several different dimensions. For example, you might want to ask why public opinion initially strongly supported, indeed seemed to call for, military intervention for humanitarian purposes in Somalia in 1992, then seemed to turn strongly against it in 1993. You would then need to differentiate between US public opinion and public opinion abroad (not least, maybe, in Somalia itself). You also might want to differentiate between mass public opinion and elite public opinion, or between the general public and issue publics, i.e. members of the general public who regularly pay attention to a particular issue, such as the humanitarian situation in East Africa. In your paper, you could focus on any one or any combination of these, but you need to be clear about it. Depending on your choice, even the underlying empirical assumptions of your question (e.g. that public opinion supported intervention in the first place or that it strongly turned against it) may need to be revised. You want to identify the most important dimensions of what you are explaining and indicate why you have chosen to focus on those dimensions. You are making an argument here for your interpretation of the dependent variable.

3. In many cases, you will then want to propose your own **theory to account for the phenomenon you are explaining**. (Properly speaking, you only have a hypothesis at this point, i.e., a not-yet-tested abstract explanation, but we'll call it a theory for now.) There may be several different parts or stages to your theory. It can be slightly complex but not so complex that it approaches the baroque. In general, if you cannot summarize the main thrust of your theory in a sentence or two, something is wrong.

**How do you develop a theory of your own?** One of the best ways to begin is to ask: how have other writers explained this or a similar phenomenon? That is, look for the theories that are either explicit or hidden in their analyses. Then, if one of the theories you discern in the literature satisfies you, you can apply it. Better still, ask whether it dissatisfies you: Does it leave out some crucial consideration; does it explain only part of what you want to explain; does it imply a general view of what is important in politics or history that does not accord with your own view of the kinds of factors that are important? If so, perhaps you can formulate a rival theory. Remember that theories developed to explain another phenomenon or a similar phenomenon in a different case may be portable, i.e., perhaps you can take part of a theory from your readings on the role of NGOs in global environmental politics and apply it to explain the role of NGOs in human rights, etc.

4. Do not stop here, that is, do not stop when you have developed your own theory and then immediately apply it. Instead, it is very important that you pause to locate—in the literature or in your mind—**rival theories**, that is to say, other theories designed to explain the same phenomenon

but with which you disagree. Locate at least one or two of these rival theories and specify them because, generally speaking, your paper will be stronger if you do both of the following two things:

- (1) show that your theory fits well with the facts, and
- (2) show that one or two rival theories do not fit (as) well with the facts.

In other words, think of your paper not as a project designed simply to state and support your explanation of a phenomenon but as a project that is going to assess a couple of theories and show why one (or even two) are superior to the others.

5. At this point—in your mind at least—*decompose your theory*, that is, break it down into a set of sub-points. One way to do this is to look again at the main question that your paper addresses and ask: What sub-questions do I have to answer in order to confidently answer that main question? Most interesting questions contain within them subsidiary questions. Usually, you cannot address all of them, but you can buttress your main argument by addressing some of them. For example, if you were asking why did Shell suddenly decide in June 1995 not to sink the Brent Spar oil platform into the deep sea off the British coast but instead decided to tow it to Norway for dismantling on land, you would probably need to know why Shell had initially made the decision to sink it. Moreover, almost any analytical question (such as, "why did Shell make this decision?"), implies prior empirical questions (such as, "how does this MNC make decisions of this type?").

6. At this time, you can begin to assemble *evidence* for and against the theories you want to discuss. This step is crucial. All arguments should be supported by empirical evidence. Ask yourself: *What should I expect to find* in the cases I am studying if this theory were true? What would I find if it were false? Bring in historical, empirical detail wherever possible.

Here you can make use of the *comparative method*, though you need not do so. Depending on the questions that you are asking, you might find it insightful to compare, for instance, over time, across countries, across different non-state actors, or across different issue areas. If you are explaining a phenomenon common to several countries, for example, the cause you identify as most important should be present in all of those countries. If it is not, it seems less likely that it is a crucial cause. Conversely, if you are explaining different outcomes across countries, look for the differences between those nations that seem most salient to the explanation. To make this kind of argument, you want to do more than recite the history of each country; you want to discuss them in explicitly comparative terms.

7. Do not at this point move directly to the word processor and begin to list your sub-points. Cut and paste routines can only do so much. Instead, make a **diagram** on a piece of paper of your overall argument and the sub-points. This will allow you to prioritize among the points in your own mind.

First, divide your points into several *categories*, for example, main points, other important points, subsidiary points, interesting asides (something like that anyway). Then think about how you want to present them.

You don't want your paper to be simply a list of your points. You need an "*organizing principle*" that will tell you which points to put first and which later. In some cases, chronology provides such an organizing principle; alternatively, if you are comparing the role or non-state actors in different countries' foreign policies, different NGOs, and so on, you can consider each in turn. But this is not always the best way to organize your paper. It is far better to figure out early how you want your explanatory argument to develop than to have to re-arrange your paper later. In logical terms, as yourself, which sub-questions should I answer first and which could come later (perhaps because the answers to some questions depends on the answers to earlier sub-questions)? You might want to save an important point for a crowning denouement at the end, but from the very beginning you want to lead the reader along step-by-step, so that s/he can appreciate the precision of your reasoning and be prepared for the punch at the end.

It is often helpful to divide your paper into sections, sometimes with sub-headings. Doing so indicates that your points are clearly organized and makes it easier for the reader to follow your argument. The process of organizing the presentation of the points in your paper will also ensure that your argument is clear to yourself. When you draw up an outline of your paper, you will often

find yourself discovering interesting points that you had not noticed before or finding that a few points you initially thought to be crucial no longer seem so important. You may need to go back and do some additional empirical research at this point, so don't wait until the day before the paper is due to get to this stage.

8. When it comes to *writing the essay*, think of it *in terms of paragraphs*. Each paragraph should convey a single unit of information. One simple rule to follow if organization is difficult for you, is to put only one main point (and relevant supporting material) in each paragraph. That is a way of forcing yourself to write clearly and without unnecessary repetition. You can go over the paper at the end to make sure that you haven't made the same point numerous times in different paragraphs.

This procedure should also make it easy for the reader to follow your argument. If you think s/he might get lost, include a bit of a *road map* in the text itself. That is to say, you can put in a sentence here and there to indicate how the point you are making in that paragraph relates to the main argument. The longer the paper, the more the reader needs the occasional reminder of how the points you are currently making fit into the overall argument. However, don't go overboard. As on a highway, the occasional road sign is a helpful reminder, but a street covered with billboards detracts from the beauty of the surrounding text.

If you cannot decide how the point you are currently making fits into the overall argument, it is a sign that the argument is unclear even in your own mind or that the point is not really germane to the argument and should be removed. To be sure, you will have to have done enough research to support your argument and to support it well. But remember that the main purpose of a research paper is not to tell the professor *how much* research you have done. Do not include empirical details just because you have come across them. Instead, the main purpose of the paper is to show that you can *use the material to make a pointed, focused argument*.

9. Even if you are running up against the assigned page limit, do not simply add a sentence or two and stop. Most papers need a carefully thought-out *conclusion* that reminds the reader of your basic theory/argument and how effectively you have proven it. The conclusion is the last thing the professor reads before s/he assigns a grade. Make it good. You don't need to summarize the whole argument—especially if it is complex—but it is usually a good idea to recap the main point. Sometimes you can save a particularly good point to incorporate into the conclusion. Alternatively, you might want to remind the reader why your theory is particularly interesting or convincing, now that it has been presented fully.

10. *Write in clear sentences*. Avoid sentences that are especially long unless you are a particularly good writer. Highly complex thoughts can be expressed in short sentences. If yours seem long or confused, break them down into shorter sentences. Make sure you are not trying to say too much in one sentence. If so, break it up. Look at each sentence in your draft. Would your roommate understand what you are saying? If not, make the sentence clearer.

*Avoid jargon*. Look at the terms you use. For instance, if you use the word "principal-agent problem" or the term "globalization," make sure you and the reader know what you mean by that. If there is any doubt, define the term in the text or a footnote. Confusing papers are usually full of ambiguous and ill-defined terms. If you are not sure what you mean by a term, figure it out or choose another term.

One more reminder. Go back over the paper and *check your spelling and syntax*. (If you do not know what syntax is, find out.) I know this seems like a picky detail in the presence of such a beautiful argument, but professors have an unusual bias against people who cannot spell, perhaps because most of them can use a dictionary, and they demand the same of others. You want the reader to be biased in your favor—careful spelling is one of the easiest ways to get that bias working for you.

Enjoy your research!