FIVE: THE GUIDE TO METHODOLOGY

The prior chapter explored how the basics of methodology. This chapter serves as a guideline for how to approach each individual methodology. These should be viewed as general guidelines; each individual piece of research is different. These guidelines should only begin the process of how you decide to undertake your study. These methods are organized how they were discussed in chapter four. First, the guide will cover qualitative methods and then quantitative methods.

Qualitative Methodology

Case Studies

In case study research, the intention is to investigate a small number of cases in great detail in hopes of proving the argument. Case studies can be designed in an unlimited number of ways: every case study research design looks remarkably different from the next. Nonetheless, the overall intention of a case study design is to define how the cause and effect relationship in your argument *really* works.

How do I design my case study?

Case studies can be designed in a variety of different ways. One of the most basic ways is to do a **(a)typical case study.** This entails choosing one (typical) case that either best exemplifies your argument OR choosing one (atypical) case that is rare that may exemplify your argument.

Otherwise, most students choose to do a **comparison case study** design with multiple cases. There are two basic ways to compare cases: **most similar design** or **most different design**. With most similar design, the objective is to choose two or more cases that are similar on many different characteristics. However, the difference between the cases should illustrate your argument. With most different design. The objective is to choose two or more cases that are different on a series of characteristics. However, the similarities between the cases should illustrate your argument. With these comparison case studies, the objective is to identify the cause and effect of the argument in either similarities or differences of the cases.

These are three examples of how case studies can be designed. In whatever design is undertaken, the same three steps should be followed: (1) identify the argument; (2) state the expectations about what we should observe in the case if the argument is valid, and what we should observe if the argument is false; and (3) explore the case (or cases) looking for similarities and differences between your expectations and what you observe. Notice, no matter what approach you take, you should make an effort to be as systematic as possible in your examination of these cases. The methodology section of the thesis should describe how these cases were selected and design was set up, but the results section of the thesis should analyze the findings of the case study design.

How do I select cases?

A case is your "unit of observation". It is the item or object that you are choosing to examine in great detail for your study. Dependent on whatever your topic, a case can be anything: an event, a person, a country, etc., Given that, there is no right or wrong way to select your cases. You could have the same question and argument, but have two different case study designs to test that argument.

Principally, you want to think about what cases are particularly rich in evidence. Some cases are inevitably difficult to include in your paper only because there is not a wealth of evidence to prove your point. Include cases in your study which will prove your point.

Observational Fieldwork

Observational fieldwork is where the researcher cedes control in order to observe a political phenomenon occurring naturally. Observational fieldwork is common in other disciplines such as sociology, but political scientists use it from time-to-time. Typically, with observational fieldwork, the researcher commits to observing political behavior of some sort in the hopes of creating a thorough descriptive analysis.

Essentially, when beginning, researchers set out to create a systematic set of standards in how to observe the behavior. These systematic standards guide the researcher in how to take **field notes**. These fields notes are the unit of analysis for the study. The field notes should be structured in order to highlight the cause and effect relationship in your argument. Sometimes these field notes can be descriptive in nature (qualitative), but other times field notes can take on a quantitative nature by tallying the frequencies of behavior. The methodology section of the thesis should describe how these fields notes were recorded, but the results section of the thesis should analyze the field notes.

Prior to beginning fieldwork, researchers should consider their observations on three dimensions. In the methodology section, the student should explain their choices but speak to relative strengths of weaknesses of the design by choosing these dimensions. First, observations can be direct and indirect. When the behavior is observed firsthand, the observations are direct. When the behavior is observed on video or written records, the observations are indirect. The benefit to having direct observations is that the researcher has firsthand knowledge of how events unfold, but is limited to a one-time observation where the researcher can miss details. The benefit to having indirect observations is the researcher can observe the event repeatedly, but is limited to the frame of reference in how the observations were recorded to begin with.

Second, observations can be participant and nonparticipant. No matter what mode of observation, researchers will affect the outcome of that behavior merely be being present. With participant observation, however, the researcher is actively participating in the behavior. For

example, if a researcher is observing voting behavior at a precinct but also participates in the election by voting, this is participant observation. With nonparticipant observation, the researcher merely observes without participating in the behavior itself. Participant observation is more intrusive than nonparticipant, but may grant the researcher additional access to behavior had they not participated in the activity.

Finally, observations can be overt and covert. Overt observations are when the researcher announces their presence and intention to the research subjects. Covert observations are when the researcher does not let their presence or intention known to the researchers. Sometimes, the researcher has no choice in letting their presence be known. Nonetheless, if the subjects know their behavior is observed, they may allow this to affect their behavior. If covert, the researcher might have to take specific actions in order to avert the subjects from their work.

Interviews

With interviews, the researcher seeks out specific individuals in order to describe specific themes inherently important within the argument. In interviews, the researcher is interested in the participant's experience, usually in regard to a specific topic. Some people compare the interview methodology to survey methodology, however, interviews allow you to get much more in-depth, more personal, and more exploratory.

To begin, most researchers find their respondents for the interviews. As small-n research, the number of respondents for interviews should not exceed a dozen. For the selection of respondents, students should focus on quality, not quantity. You want to make sure that the respondents will give quality responses that will elucidate the type of detail required to prove your argument. Also, in some instances, interviews are especially appropriate if the argument requires the perspective of a specific population (e.g., politicians, administrators, students, etc.,) Nonetheless, in the methodology section, the process by which the respondents were selected should be explained in full.

Ultimately, the aim of the interviews is to collect quotes from the respondents. These quotes are to be organized thematically in your analysis. You will include these quotes (sometimes in blockquotes) but the analysis is a thematic dissection of the types of responses received in the process. Thus, in order to ensure that that the analysis is fruitful, there needs to be quite a bit of preparation in the interview process.

After deciding on *who* your respondents will be, the next step will be deciding what to ask them. Interviews should start with a basic script. A script usually has a handful of open-ended questions that invite detailed responses. Students should aim for a 30 to 60-minute interview for each respondent. A good, carefully constructed script will have up to a dozen questions. Students should also think carefully about probing questions. Probing questions are usually a "follow up", done "on the fly", in order to get more detail from the respondent in that moment. These probing questions should come at the service of obtaining evidence in order to prove the argument. The

script itself should be carefully assessed and proofread. Some students might elect to pretest the script in order to see how someone may respond to the questions.

The interview itself needs to be recorded and transcribed. Most cell phones have recording software and storage capabilities that make this simple and straightforward. Prior to starting the interview, the student must ask for permission to record the interview. If the respondent does not agree, the student has the option to take written notes. Most students choose to make the respondents anonymous in their final thesis, with the intention of assuring their respondents that their responses will be kept private. For some projects, this might be necessary given the sensitivity of the issues at hand.

Transcription is the process of typing out complete transcripts from the obtained recording. Transcription is a time consuming process. However, transcription is important because it allows the researcher to step back and assess the thematic patterns of the interviews. If a researcher relies solely on written notes and memories, this will yield unreliable results. These complete transcriptions are *not* included in the final thesis as they span dozens and dozens of pages in most cases. The transcription is only used for the researcher in order to cultivate the quotes which they will use in their thesis. The analysis is a carefully assessed presentation of all the interviews, highlighting the thematic elements of the exploration.

Finally, keep careful, detailed notes on how you have proceeded through conducting the interviews themselves. You have options for how to conduct interviews, but your specific process should be described in the methodology section of your paper. You should give enough detail that the reader knows how you conducted your research and could even replicate your research if they desired.

Theoretical Research

Theory-based research means that the student has elected to focus on normative questions and issues in providing evidence for their argument. This type of research does *not* involve empirics of any kind—the recording, observing, or analyzing of data. Another way to think about theoretical research is that this is the approach taken in the *political theory* subfield of political science. That being said, there are many different approaches to theory work. The approaches are based on a number of different factors including the topic at hand, preferences within the subfield, and established work already on the topic. With theory-based research, the analysis entails *reading* the work of other scholars. However, this differs from a literature review in the sense that the researcher is doing active, new work in reconfiguring or deconstructing the work of other scholars. In this thesis class, we recommend two approaches to theory-based research: application and critique.

For most theory-based research, there is no formal methodology section. Most students collapse the methodology section with the analysis. Somewhere in the beginning of the analysis, however, students should describe their approach in analyzing their ideas.

Application

An application entails finding a scholar that has presented a theoretical argument in either a book or journal article. This already existing argument should deal with the ideas contained within your own project. However, the already existing argument might not pertain to a current, contemporary issue that you wish to examine. A thesis using application takes an existing argument made by another scholar in order to explain a contemporary event or issue.

For example, a student elected to use application in a thesis about representative democracy. This student used the works of Greek philosophers: Plato, Aristotle, Socrates. The research involved a detailed reading of selected works of these philosophers. However, the student used selections of their work to prove that the elements representative democracy instilled by Athenian philosophers no longer held true in the United States government. With any theory-based research, the researcher has a wide amount of discretion in how they want to use and analyze the work of previous scholars. This student elected to read and then select a number of ideas from each scholar in order to address how ideas shared by these philosophers no longer held true in the US.

Critique

A critique *also* entails finding a scholar that has presented a theoretical argument in either a book or journal article. However, the analysis should only focus on this selected, already-established argument. This already existing argument should contain ideas that you want to directly challenge and engage with in your analysis. Essentially, in a critique you want to provide an alternative viewpoint from a scholar who may be already well established and written about in your literature.

For example, a student elected to use critique in a thesis about structural racism in the United States. This student chose to analyze structural racism from the perspective of critiquing critical race theory. Critical race theory is a framework that has existed since the 1970s that argues racism is engrained in American legal and political institutions. Since the 1970s, many scholars have written about and under this framework. However, this student chose to examine one of the originators of critical race theory. Derrick Bell wrote *Race, Racism, and American Law* in 1973. This book is widely recognized as one of the first to engage with the tenets of critical race theory. This student re-visited this book to critique the original ideas presented in critical race theory. Again, with any theory-based research, the researcher has a wide amount of discretion in how they want to use and analyze the work of previous scholars. This student carefully read Bell's work and highlighted specific passages and ideas to present an alternative perspective of critical race theory.

Quantitative Methodology

Data Analysis

Data analysis is at the heart of quantitative methodology. Data analysis specifically refers to the use of numeric data in addressing an argument. Data analysis involves the use of statistics via specific programs (e.g., SPSS, SAS, R, Stata), but the presentation of statistics widely differs from project to project. Data analysis can present findings as simple as descriptive statistics or crosstabulations, but as complicated as regression analyses. The presentation of the data analysis depends on the topic, the availability of data, and the preference of the subfield at hand. In many subfields now, including American politics, public administration, and comparative politics, but even public law and international relations, scholars have relied more and more on data analysis.

Please note, if electing to use data analysis, you must have taken or enrolled in Political Science 205: Introduction to Research Methods. This course covers the use of statistics in data analysis. Before committing to quantitative methods and data analysis, you must determine the availability of data for your topic. In the past, many students have assumed the relevant data exists or the collection of data is a fairly easy process. *Do not make this mistake.* If you commit to data analysis, you should have already identified a publically available dataset *or* a specific strategy to collect the data yourself.

Data analysis and quantitative analysis can come in the form of specific chosen methodologies. The remaining sections of this chapter are devoted to describing these methodologies. Survey research, survey experimentation, and content analysis are all forms of quantitative data analysis. These methods most often involve collecting your own data, however you can find publically available datasets that are survey data or content analysis data. You may also find publically available data in another form and bypass any of these methods described in the following pages.

Note: A common mistake students have encountered in the past is using graphs and charts in published books or journal articles. Students have literally copy and pasted graphs and charts of other work and called this "data analysis". This is *not* data analysis. Also, you usually cannot extract this data from the charts and tables in a way that is sensible to analyze on your own. Sometimes, scholars make the dataset available (they will provide directions for how to download the article in the pre-matter or appendix of their manuscript). You can also attempt to directly email these scholars and ask them for their data. In most instances, you need to begin data analysis with a spreadsheet of data.

Survey Research

Survey research is incredibly common in the social sciences. A survey involves asking respondents about their behaviors and opinions. For political science, survey research allows researchers to decipher people's political behavior. Essentially, you ask people questions about politics to sort out your argument. Survey analysis involves considering the following: survey type, questionnaire design, respondent sampling, administration, analysis.

Survey research involves a number of different options about the design of the survey. These should be described in the methodology section of your paper. These decisions should be

clarified to the extent that the reader understand how you conducted your survey, but could also replicate your study if they wish.

Survey Type

There are various types of surveys. A survey type is the mechanism by which you administer the survey. In this section, we cover paper-and-pencil surveys and Internet surveys. Most students use a paper-and-pencil questionnaire for thesis.

A paper-and-pencil questionnaire requires the student to print physical copies of the survey and administer them in person. Keep in mind, with this survey type, copies can be expensive. Surveys can often span pages and pages. Most students elect to keep the survey length from anywhere to 2-to-5 pages. However, formatting of the questionnaire needs to be clear and attractive for respondents. If the questionnaire has errors, your respondents will not take your study seriously. With paper-and-pencil questionnaires, the most common way to administer the survey is before classes begin, randomly approaching people on campus, or administering the questionnaire to specific populations.
An Internet questionnaire requires the student to find an online service to administer the survey. This is often times much more affordable than a paper-and-pencil questionnaire, but limits your respondents to anyone who has Internet access and requires technical expertise. In the past, students have used SurveyMonkey and Google Surveys to administer their survey. Beginning in 2017-2018, the Department of Political Science has access to Qualtrics, which is an online survey software program. Students receive no formal training and will be responsible for learning how to use these tools on their own. With Internet questionnaires, you often need the emails of your respondents *OR* you can share a survey link on your social media sites.

Questionnaire Design

Whatever the survey type you choose, questionnaire design is of the utmost importance. This includes the appearance and formatting of the survey itself. Also, students will receive no formal training in how to format Word documents, but a sloppy survey will affect your results.

Most importantly in design, researchers pay close attention to question wording and question ordering. First, technical competence, grammar, and spelling are all important. You need to carefully proofread your questionnaire and even have several other people proofread your questionnaire. The questions need to be crystal *clear.* If not, your thesis would be open to significant criticism in that you are measuring a concept or idea totally different than what you originally intended. Some researchers will consult the national, publically available surveys to copy the wording of specific questions.

For question wording, researchers pay attention to how the words in the survey questions might elicit opinions in their respondents. A simple problem with wording involves what people commonly describe as “double-barreled” questions. A double-barreled question (also called a competing option question) is one that touches upon several issues, but requires only one answer.

Make sure each individual question only asks about one idea or concept. Another example is how the question is "framed", which can also significantly affect people's responses. Framing the question appropriately means that the question is not biased in a significant way. For example, when asking about political issues in particular, you never want to frame issues as "negative", "positive", "good", "bad". If you do want to talk about different sides of the issue, it is your responsibility to give the respondents the complete picture.

For question ordering, the ordering the questions appear in the questionnaire can affect respondent's answers. For example, if you ask demographic questions *first,* many of these questions involve sensitive personal information like income, education level, and political affiliation. In any subsequent questions, the respondents might be concerned about their privacy and will hide their true beliefs and opinions, or even worse, stop taking the survey questions altogether. Sensitivity in demographic questions are common in survey research, thus they always should be moved to the end of the questionnaire. However, think about the types of questions you are asking and whether or not earlier questions will affect later responses. A general rule of thumb is to keep the most controversial or troubling questions to the latter part of the questionnaire.

You also have to decide between using multiple choice or open-ended questions. Most surveys use multiple choice because it is far easier to code those responses. However, even in multiple choice questions, you need to be certain that you are providing a complete set of options. For example, on some behavioral questions, most students fail to allow respondents to answer "Don't Know" or "No opinion". These are valid responses to questions that are interesting in their own right, but not having these options forces a respondent into an opinion they might not even hold. If you use open-ended questions, you have to develop some system to code these responses. This can often get messy, especially if you ask about bigger ideas in these open-ended questions.

Respondent Sampling

Respondent sampling refers to the population of people that will end up being a part of your study. Sampling is an important part of the survey, as who is in your study will determine the type of responses you receive. For example, if you only sample students on campus, the responses will be radically different than a survey of individuals across the entire state. You need to describe how you sampled your respondents in the methodology portion of your thesis.

The goal is always to draw a random sample. That being said, this is pretty much impossible in senior thesis. A random sample will approximate responses from the entire intended population. The only way to draw a random sample is to have a complete list of everyone (and a mechanism to contact them) in the population that you are intending to study. In thesis, we draw what we call **nonprobability samples** (or non-random samples). There are various different nonprobability samples you can utilize.

For example, **purposive sampling** involves a considerable amount of discretion over the respondents you include in your sample. You are purposely surveying a segment of people,

because the study calls for it. Many students choose to study the opinions and attitudes of other students, thus a purposive sample may only survey students on campus. **Convenience sampling** allows the researcher to include respondents simply because it is convenient or easy for the researcher to do so. Again, many students choose to survey other students because it is pretty straightforward to do! However, if there is no real reason to survey students for your study, this is a convenience sample rather than a purposive sample. **Quota sampling** allows the researcher to sample elements in proportion to their representation in the overall population. For example, if you are studying race and ethnicity, you might want to sample people to you reach each respective element in the sample. For example, the 2010 US Census estimates that our country's population is 12.6% Black or African-American. In your survey, you will survey respondents until you hit a quota of 12.6% in your own study. Finally, **snowball sampling** is when respondents are used to identify other persons who might be included in the sample. This is most often done for hard-to-find or rare populations. You might want to survey political activists for example, but there is no national or local list of activists, thus you would find a handful of activists through your own personal contacts. After you administer the survey, you would ask each respondent if they can suggest people who would be appropriate for the survey. Thus, your sample would snowball after each successive respondent.

The number of respondents (also called *n* or number of observations*)* is also something to consider. For a national survey, we only need about 1000 random respondents to get a good sense of opinions and attitudes. For a population of 20,000 (Cal Poly Pomona), you need about 600 random responses to get a good sense of opinions and attitudes. For a population of 300 (political science major), you need about 200 random responses to get a good sense of opinions and attitudes. For students completing thesis, this is an unrealistic expectation. As we do not have the resources to even conduct random samples, we do not expect students to obtain the expected sample sizes in each of the examples above.

Important: For senior thesis, the general expectation has been that students survey anywhere from 75 to 200 respondents. Again, this is well below the intended sample size, but we allow this for practicality reasons. In addition, we do not expect students to utilize random sampling methods. Any sampling method is acceptable, as long as the student clearly, accurately, and comprehensive describes how they sampled respondents for their survey.

Administration

The administration of the survey refers to the process in which you have respondents complete the survey. No matter the survey type, this requires time and patience. For paper-and-pencil questionnaires, you have to physically wait until your respondent completes the survey. You should have a rough estimate for how long it takes to complete the survey and *write down the estimated time completion on the survey itself*. If you administer the survey in a large group like a classroom, this will obviously cut down on the time it takes to administer the questionnaire. For Internet questionnaires, you are responsible for recruiting your respondents. No matter if you email or share the link, the response rate may be low. If you wish to have 100 respondents in

your survey, you may have to email more than 300 people or share your survey link in various different forums.

Analysis

After you have extensively covered each of the previous elements of survey design, you should think about how to analyze this data. Ultimately, the goal is to convert your survey responses to a numerical spreadsheet. For many of the online services that allow you to conduct an Internet survey, they automatically format your responses into an Excel or SPSS spreadsheet. If you are using a paper-and-pencil questionnaire, you have to code your responses into an Excel spreadsheet on your own.

For a paper-and-pencil questionnaire, you need to develop your own coding system to input the responses in the spreadsheet. A spreadsheet program, like Excel, has both rows and columns. The way to think about your survey responses is that each row represents a person who took your survey. Each column represents an individual question in your survey. Across a single row, you would record all of the person's responses to the survey, with each question in a different column. For some questions, this system may be more complicated.

This coding requires careful notation. It is easiest to sequentially number each survey with a marker on the first page of each survey (e.g., 1, 2, 3, 4, etc.,) The first column in your spreadsheet should correspond to this unique ID number. This way, you can save the physical copies of your survey and refer to them if there's any later confusion. The next column should be the first question in your survey. For multiple choice questions, each multiple choice response should be given a unique code. For example, if your responses are "Strongly Agree", "Agree", "Neutral", "Disagree", and "Strongly Disagree", you should code each category as "1", "2", "3", "4", and "5". The goal is to convert all the survey responses to numbers and have it all on the same spreadsheet. The only letters in your spreadsheet should be in the header row that describes what the column is. And even then, you should avoid special characters and spaces in the header row, as it will be impossible to read in whatever statistical program you decide to use.

Survey Experiment

Survey experiments should be thought of as a subset of survey analysis itself. You have to read the previous section on surveys, but essentially, you include an experiment as part of your analysis. With experiments, the researcher thinks of their sample as two separate groups: a treatment and control. Experiments involve administering some sort of external manipulation to the treatment group to assess how the treatment affects the responses to the questions.

For the methodology section, you should describe the process by which you designed the survey itself. But in addition, you should explain how you designed your treatment, the process by which your respondent was assigned in each group, and your expectation for the differences between these two groups.

What is a treatment?

A treatment is an external manipulation that can come in multiple forms for a survey. The manipulation can be additional information, photos, videos, or even a manipulation separate from the questionnaire itself. The idea is that the treatment elicits some sort of different response in your survey questions. The analysis would compare and contrast the two groups of respondents with an appropriate statistical test. If there is a significant difference between the two groups, the treatment worked to manipulate the respondent.

A good example of a survey experiment was a student who administered a survey about people's opinions of war, particularly in Iraq and Afghanistan. The treatment group received a survey questionnaire with images of September 11th, excerpts from speeches given by President Bush, and patriotic images. The control group received none of these manipulations, it was just a plain survey. The student found that the respondents who received the treatment answered the questions differently than those in the control group.

Another example of a survey experiment was a student who administered a survey about the national healthcare law. The treatment group had a survey where the law was explicitly called "Obamacare" throughout the questionnaire. The control group had a survey where the law was called "The Affordable Care Act". Those respondents in the treatment group significantly showed less support for a national healthcare law versus the respondents in the control group.

Finally, the treatment does not *always* have to be on the survey questionnaire itself. This is a more complicated task, but some studies develop ingenious ways to test various arguments. For example, one study wanted to investigate the effect of protest music on political attitudes. Thus, the researcher invited respondents to take the survey in a classroom where music was playing in the background. The control group took the survey in a quiet classroom. Another example on studies that have involved gender. In some of these studies, it is common to use two survey administrators from each gender. The survey in both groups are identical, but the treatment is the survey administrator themselves.

Assignment of groups

In order for experiments to properly work and be correctly assessed, you must randomly assign your respondents to a treatment and control. For treatments contained in the paper-and-pencil questionnaire itself, this is achieved by randomly shuffling the two versions of the survey. You need to keep track of the two versions of the survey however. This is easily done by labeling each version at the top with a simple ID number. When coding the survey, create a new column called "Experiment" and indicate which group the respondent is in. The analysis comes from comparing these two groups of individuals on a variety of other questions in the survey that you think the manipulation might affect.

Content Analysis

A content analysis is a quantitative document analysis. In a content analysis, researchers extract numerical excerpts, quotations, or examples from the nonnumerical written record to support an observation or relationship. A very common example of content analysis investigates the *frequency* of a specific term, word, or idea that is utilized within a text. The frequency of appearance of certain terms or ideas lead to the idea that there are patterns within the text itself that deserve to be highlighted in your argument. In the methodology, you are tasked with identifying your text, operationalizing your concepts or ideas, and coding your text.

Identifying the text

The first thing to do is to identifying what materials will be included in your analysis. The materials refer to the text you decide to use. The text can widely vary from project to project. For example, if you are studying the values inherent in the political parties, perhaps you would use the major party platforms as your text. If you are interested in studying sexism in political news coverage, perhaps your text is the transcripts from ten randomly selected network news interviews with Hillary Clinton. If you are interested in analyzing the patterns of how conservatives make their argument, perhaps your text is a randomly selected assortment of fifty conservative op-eds in the Wall Street Journal.

There are numerous political texts in the world: newspaper articles, magazine articles, speeches, social media posts, candidate websites, interview transcripts, etc. The possibilities here are endless. However, you must describe how you found your text. The text itself is only for research purposes but does not need to be included in the thesis. If there is a huge universe of text in your topic area, you are responsible for devising a method to *randomly* or *purposely* sample your text. For example, if you have 500 newspaper articles to select from, it may be overwhelming to include each article in the analysis. If you could somehow select a subset of these 500 in a random way, you should. Nonetheless, you are responsible for describing exactly how you found your text and identifying any weaknesses in the sample you ended up deciding on.

In deciding upon the number of items to have from your text, the general rule of thumb is to aim from anywhere from 75 to 200 different items. Thus, you should focus on collecting either 75+ newspaper articles, speeches, social media posts, etc.,

Operationalizing the concepts

In operationalizing the concepts, you have to decide *exactly* what you are looking for in the text. Operationalization is another word for "measure". Presumably, you are interested in general broad ideas in your question and argument. How would you measure or operationalize these ideas in the text? You need to decide exactly what content you will be examining within the text itself.

For example, content analysis is very common in different studies of gendered political coverage. To identify potential sexism in how journalists covered political candidates, there are established lists of words and phrases in how someone might write about male and female candidates. For example, men might be described with words like "powerful", "decisive", "experienced", or "strong". Women might be described with words like "compassionate", "soft", "patient", or "kind". Nonetheless, this decision of how you will operationalize is arbitrary. However, it must logically tap into the broader ideas in your argument. In the methodology section, describe why you think certain phrases, words, or terms logically operationalize the ideas you are working with.

Coding the text

Finally, you need to devise a coding scheme in order to transform the text into numbers. You should first begin by sequentially numbering each individual item of text in your analysis. For example, if you are analyzing 75 campaign speeches, label each speech with an individual number (e.g., 1, 2, 3, 4, 5, etc.). Second, start a written document where you decide how you will code each individual text you decided to include in your sample. This will contain the rules for the words, phrases, terms, patterns you are looking for in the text. Another way to think about this written document is the specific directions for how you operationalize the text.

Third, in an Excel spreadsheet, you should actually begin coding the text. A spreadsheet program, like Excel, has both rows and columns. The way to think about your text is that each row represents each individual item of text. In the previous example, each row would be one speech. Each column represents some sort of element of that individual item of text. Essentially, these are numerical observations of the text you are working with. The numerical observations are how you decided to operationalize the text. Remember, how you decide to operationalize the text is completely arbitrary but should be logically connected to your argument. In the previous example, this might be the frequency of the word "people" within the speech itself. It may appear zero or 15 times during respective speeches. You should aim to have anywhere between 15 and 100 different columns in your spreadsheet.

Finally, the next step would be to use this spreadsheet in order to analyze the patterns in the text. You should think of descriptive statistics, graphs and charts, but also full statistical analysis relating the columns in your spreadsheet. This statistical analysis should ultimately be in the service of identifying relevant patterns in the text which correspond to your argument.

Public Policy Analysis

From your experience in many different public administration courses, you may have experience or exposure to public policy analyses. PLS 417: Policy Analysis and Program Evaluation is an excellent example of a course where you may receive firsthand experience in this type of analysis. Policy analysis is defined as a systematic approach used to help policymakers make decisions in the face of uncertainty. Policy analysis is usually written to a specific audience: politicians, citizen constituents, academics, government officials, the media, groups or

organizations, companies, etc. Policy analysis also comes in many different forms: a short report, a full research study, a memo to officials, etc. In thesis, you should probably think about your analysis

Separately, you should think of policy analysis as its own methodology that you can elect to do for your thesis. However, a policy analysis is a unique approach found outside of political science. Many policy analyses also incorporate many of the methods we describe above.

What distinguishes policy analysis from the above methodology?

The policy analysis is distinguished by what is often described as a mapping process. The mapping process begins with a problem. We identify this problem in outlining our research question early on in the thesis process. Different policy analysts use different mapping techniques, but the mapping process involves describing potential solutions in a number of different iterative steps.

Students should map their problem with thinking through how to solve that problem. But on a sheet of a paper, where the problem is described at the top, students should consider a number of separate questions about the problem?

- Alternatives: How do you solve the problem? There are many ways to solve any given problem, brainstorm all the different ways you can think of.
- Criteria: What are some ways that we evaluate your alternatives or solutions? By what criteria can we judge the alternatives?
- Questions: What are some additional or further questions to ask about the problem?
- Outcomes: For each of the alternatives you list, what are some likely outcomes at the end of this process?

The mapping process is a difficult process, but it is crucial to point out that there is NO CORRECT manner to map out your problem. Mapping your problem is a strategy to provide the best possible solution for your audience. Instead of a methodology section, consider having a section of your thesis where you map out this problem. You should describe your full thought process in how you brainstorm through the mapping process. You can and should include diagrams that explain your map.

What is the analysis?

Once you complete the mapping process, you should compare each of your alternatives with your criteria. This can be done in a simple table or matrix where the alternatives are listed in rows and the criteria are listed in columns. From this matrix, you should attempt to logically rationalize which alternative is the best from the ones you have brainstormed. You should think about this as the best solution to the problem. You should include the matrix and explanation at the end of the section where you map the problem.

For the analysis, think about how you can conclusively analyze the alternative which you have chosen as your best solution. There are many ways to do analyze alternatives. In fact, many policy analysts use methods like surveys, data analysis, case studies, etc., to argue that this alternative is the best solution to the problem.

Remember, the policy analysis is written to an academic audience. The final product for this analysis is an academic study with a question (problem), argument (best solution/alternative to that problem), literature review, the mapping approach you used to solve this problem, and an analysis where you provide evidence this is the best solution to the problem.

Again, this is a very different approach to any of the methods previously described, but you should consider this methodology if you are interested in public administration or public policy work.